

**INTRODUCTION**

The Presidential Proclamation which establishing Grand Staircase - Escalante National Monument (GSENM) directed the Secretary of the Interior to prepare a management plan for the Monument. The Proclamation also directed that the Monument be managed pursuant to applicable legal authorities. In accordance with these directives, the Monument Planning Team embarked on the planning process described in Chapter 1. A Draft Management Plan and Draft Environmental Impact Statement (DMP/DEIS) was published in November 1998.

The original 90 day public comment period was extended for an additional 30 days, ending on March 15, 1999. About 6,800 written responses were received, as well as hundreds of verbal comments gathered by the Team during a series of public information meetings held across the Nation. These comments were analyzed and carefully considered, along with recommendations from Bureau of Land Management (BLM) and Department of the Interior officials. The Proposed Plan is based upon the Preferred Alternative laid out in the DEIS, with modifications to reflect public comment.

**GENERAL DIRECTION**

This Proposed Management Plan is founded on the directions outlined in the BLM 1997 Strategic Plan. All lands administered by the

BLM, including Grand Staircase - Escalante National Monument, are managed to achieve this mission:

Sustain the health, diversity, and productivity of the public lands for the use and enjoyment of present and future generations by:

- serving current and future publics;
- restoring and maintaining the health of the land;
- promoting collaborative land and resource management; and
- improving business practices and human resource management.

**MONUMENT MANAGEMENT DIRECTION**

Grand Staircase - Escalante National Monument is unique among the public lands managed by the BLM. Its size, resources and remote character provide a spectacular array of scientific, public education, and exploration opportunities. It also has a purpose, delineated in the Presidential Proclamation, that is more specific than other BLM administered lands. The following two basic precepts provide the overall vision for future management of this very special place.

1. First and foremost, the Monument remains a frontier. The remote and undeveloped character of the Monument is responsible for the existence and quality of most of the scientific and historic resources described in the Presidential Proclamation.

Safeguarding the remote and undeveloped frontier character of the Monument is essential to the protection of the scientific and historic resources as required by the Proclamation.

2. Second, the Monument provides an unparalleled opportunity for the study of scientific and historic resources. In addition to the study of specific scientific resources, this setting allows study of such important issues as: understanding ecological and climatic change over time; increasing our understanding of the interactions between humans and their environment; improving land management practices; and achieving a properly functioning, healthy, and biologically diverse landscape. Scientific study would be supported and encouraged, but potentially intrusive or destructive investigations would be carefully reviewed to avoid conflicts with the BLM's responsibility to protect and preserve scientific and historic Monument resources.

Within these two basic precepts, the Proclamation and management policy specify that other activities can and should continue to occur. Four additional statements round out the overall vision for GSENM.

- C While much of the Monument exhibits qualities where the Earth and its community of life show little evidence of human influence, it is also true that generations of people have used lands within the Monument for many different purposes.

The Proclamation directed that the Monument remain open to certain specific uses under existing laws and regulations. These include valid existing rights, hunting, fishing, grazing and pre-existing authorizations. To the extent consistent with existing rights, these uses would be managed in a manner that protects Monument resources.

- C The Monument staff would work with local communities to provide needed infrastructure development such as communications sites and utility rights-of-way. As with other uses, this type of development would be limited to small areas of the Monument. In addition, it must be done in a manner that would not cause serious impacts to protected resources or significantly change the undeveloped character of the Monument.

- C While interpretation and recreation would be accommodated, and in some areas developed, the intention of these management activities would be to contribute to the protection and understanding of Monument resources. Developed recreational and interpretive sites would be limited to small areas of the Monument. At these sites visitors could experience, and come to better understand, the scientific resources of the Monument and the process and importance of scientific research in improving our knowledge of natural systems. This could be accomplished without causing serious

impacts to the resources themselves. Undeveloped recreation would be accommodated as long as no significant impacts to Monument resources would occur. Limits on large groups, commercial uses, and even limits on overall numbers of individuals would be used when needed to prevent impacts to Monument resources.

- C Finally, the short history of the Monument has already established a pattern for an inclusive and collaborative effort to protect, identify, assess, and where appropriate, research or interpret resources found in GSENM. The Monument staff would continue to work with local, state and Federal partners, scientists, Native American Indians, and the public to refine management practices that would insure protection, facilitate scientific and historic research, respect authorized uses, and allow appropriate visitation.

The remainder of this chapter describes objectives and actions aimed at fulfilling the principles above. The following section describes a set of general management objectives common to all resources. These general management objectives are followed by a discussion of objectives and actions specific to the major resources considered in this Plan. The resource discussions are followed by a description of a zoning strategy designed to manage uses in accordance with resource protection objectives. Following the zone discussion, actions such as research and

livestock grazing that would be managed the same across zones are discussed.

## OVERALL RESOURCES AND MANAGEMENT OBJECTIVES

Given the above direction and the direction found in the Proclamation, the Federal Land Policy and Management Act (FLPMA), and other governing laws, the overall objectives of the BLM with respect to the geological, archaeological, historic, biological (including soils, vegetation, fish and wildlife, and special status species), water, and air resources would be to:

- C manage uses to prevent damage to the resources listed above,**
- C increase public education and appreciation of such resources through interpretation, and**
- C facilitate appropriate research to improve understanding of such resources and to improve methods of protecting these resources.**

A discussion of how these objectives would be achieved for each resource follows this section. The discussion includes more specific objectives and actions for each resource where appropriate. Further actions aimed at meeting these overall objectives, including a zoning strategy, are also discussed in subsequent sections. More detailed background on each resource can be found in Chapter 3 of the DEIS.

## SPECIFIC RESOURCE OBJECTIVES AND ACTIONS

### GEOLOGY

**“...The monument is a geologic treasure of clearly exposed stratigraphy and structure...” (Proclamation 6920, 1996)**

Ranging in age from Permian through Quaternary, the sedimentary rocks and surficial deposits within GSENM record nearly 270 million years of the geologic history. These geologic strata are important for the outstanding research opportunities that they present and for the scenic beauty that they create.

Generally, the major geologic attributes of the Monument, such as regional stratigraphic units and regional structures, are not at risk of degradation from land management practices or visitor use. For the most part, the landform sculpting processes involving a combination of water, wind, and tectonism began in the more recent geologic past and continue unabated today. Geomorphologic features such as arches, natural bridges, hogbacks, pinnacles, and slot canyons (small-scale expressions of geological processes) are the features people most often associate with the term “geology.” In fact, most of the scenic qualities of the Monument exist because of the combination of climatic processes, geologic structure, and the underlying rock-types.

Much as the geomorphology of the Monument holds the interest of visitors, some of the features themselves can be hazards and are often the result of processes that constitute other geologic hazards. Geologic hazards can include flash floods and debris flows, landslides, rock falls, expansive and collapsible soils, and naturally ignited coal fires.

Program efforts for inventorying and assessing the potential for geologic hazards as they might relate to visitor safety, visitor facilities, rights-of-way, communication sites, and transportation routes would continue. Visitor activities could be restricted in high-hazard areas or in areas where damage to sensitive geomorphologic features may occur. Examples include restrictions on camping in known flood channels, debris basins, sensitive soil areas, or rock-climbing near arches or natural bridges. Design or location of designated primitive camping areas, trailheads, or communication structures may be affected by geologic hazards. Further management actions aimed at meeting general resource protection objectives are outlined later in this chapter.

### PALEONTOLOGY

**“...The monument includes world class paleontological sites...” (Proclamation 6920, 1996)**

Monument lands contain widespread and varied paleontological resources. Paleontological sites contain a wealth of information about prehistoric life and environments during the last part of the Paleozoic Era (about 270 million years ago) as well as throughout the Mesozoic Era (245 to 66 million years ago). The sequence of rocks found on the Kaiparowits Plateau contains one of the best and most continuous records of Late Cretaceous terrestrial life in the world. Monument paleontological resources are important to members of the scientific community as well as academic institutions, private organizations and other interested individuals from around the world. These sites also provide opportunities to visitors for education and enjoyment.

The BLM would continue to inventory the Monument for paleontological resources and evaluate their potential for protection, conservation, research, or interpretation. High-use areas within the Monument would have high priority for inventory efforts. Beyond high-use areas, inventory and research efforts would be expanded to fill in the information gaps on formations and other information needs. Such research would be coordinated as part of the adaptive management framework discussed in Appendix 3.

A range of methods to manage visitor use and other activities would be used to protect paleontological resources from intentional or inadvertent damage. Many of these prescriptions are discussed in subsequent sections, along with other actions aimed at meeting general resource protection objectives. Among other things, these prescriptions would limit vehicular travel to designated routes and prohibit collecting of Monument resources without a permit to do so for research. A monitoring program would be used to assess management needs of sensitive sites and areas. In addition, all proposed projects would be required to include a paleontological site inventory, and appropriate strategies would be used to avoid sensitive sites, restrict access to the sensitive resource (i.e., construct barriers), or as a last resort, excavating and curating the resource.

Public education and interpretation would also be emphasized to improve visitor understanding of paleontological resources and to prevent damage. Collaborative partnerships with volunteers, universities and other research institutions would be pursued to document, preserve, monitor or interpret sites consistent with the overall objective of protecting paleontological resources.

## ARCHAEOLOGY

**“...Archeological inventories carried out to date show extensive use of places within the monument by ancient Native American cultures...Many more undocumented sites that exist within the monument are of significant scientific and historic value worthy of preservation for future study...” (Proclamation 6920, 1996)**

Monument lands contain an extensive array of varied, non-renewable prehistoric archaeological sites, including clusters of unique sites that represent contact between the Fremont and Anasazi, particularly in the Kaiparowits region. These “cultural resources” are valued by Native American Indian tribes, local communities, the scientific community, private organizations and interested individuals from around the world. These sites represent an important record of prehistoric and historic cultures and events that have intrinsic value to contemporary Native American Indians who still have cultural, historic and religious ties to these resources. Furthermore, these prehistoric sites provide opportunities to visitors for education and enjoyment.

The BLM would continue to inventory and conduct project compliance for archaeological resources. This would be done in order to evaluate their potential for protection, conservation, research, or interpretation. Cultural surveys in high-use areas, such as along trails and open routes, would be

prioritized to ensure protection of vulnerable resources. Beyond these areas, inventory and research efforts would be expanded to fill in the information gaps and complete research that would contribute to the protection of sites. Such research would be coordinated as part of the adaptive management framework discussed in Appendix 3. The BLM would use the information collected to create a better understanding of cultures, join with the other sciences in interdisciplinary studies for improving land management practices, and work to showcase and preserve remnants of Native American Indian cultures within the Monument.

A range of methods to manage visitor use and other activities would be used to protect archaeological resources from intentional or inadvertent damage. Many of these prescriptions are discussed later in this chapter, along with other actions aimed at meeting general resource protection objectives. Among other things, these prescriptions would limit vehicular travel to designated routes, limit dispersed camping in certain areas, and would prohibit collection. In addition, all proposed projects would continue to include a site inventory for archaeological resources, and appropriate strategies would be used to protect sensitive sites. This would include avoiding the site altogether, restricting access to the sensitive resource (i.e., construct barriers), interpreting the resource, or as a last resort, excavating and curating the resource.

Public education and interpretation would also be emphasized to improve visitor understanding of archaeological resources and to prevent damage. Archaeological site etiquette information would be readily available to Monument visitors. Collaborative partnerships with Native American Indians, outfitters and guides, volunteers and universities would be pursued to document, preserve, study, monitor or interpret sites consistent with the overall objective of protecting archaeological resources.

Traditional Cultural Properties are those sites recognized by contemporary Native American Indians as important to their cultural continuity. These sites would be identified, respected, preserved and managed for continued recognized traditional uses. Consultation with the appropriate Native American Indian communities would be a priority. Uses on archaeological sites that cause site damage and/or that are inconsistent with the protection and use of Traditional Cultural Properties would be prohibited.

## HISTORY

**“...The monument has a long and dignified human history; it is a place where one can see how nature shapes human endeavors in the American West, where distance and aridity have been pitted against our dreams and courage...” (Proclamation 6920, 1996)**

The distances, aridity, cliffs, and terraces have indeed shaped the communities which are

located on the periphery of the Monument. It is, in fact, these factors that severely limited historic era settlement *within* the boundaries of GSENM and produced the landscape we see today. The Monument is surrounded by a number of communities that were established between the 1860s and the 1880s by Mormon settlers looking for new resources and lands to support their families. Early Mormon pioneers left many historic objects. These include trails, inscriptions, remnants of old towns (such as the Old Pahreah townsite), cabins, and cowboy line camps. They also constructed and traversed the renowned Hole-in-the-Rock Trail as part of their epic colonization efforts. Mormon settlers built homes, developed dams, reservoirs and irrigation systems, constructed wagon roads and livestock trails, and established cemeteries around and within the Monument. Evidence of many of these still exists.

In order to protect these important historic resources, the BLM would continue to inventory the Monument to identify historic resources and to evaluate their potential for conservation, research, or interpretation. This would include efforts to evaluate historical and cultural properties for nomination to the National Register of Historic Places. Surveys in high-use areas such as along trails and open routes would be prioritized to ensure protection of vulnerable resources. Beyond these areas, inventory and research efforts would be expanded to fill in the information gaps and complete research that would contribute to protection of sites. Such

research would be coordinated as part of the adaptive management framework discussed in Appendix 3.

A range of methods to manage visitor use and other activities would be used to protect historic resources from intentional or inadvertent damage. Many of these prescriptions are discussed later in this chapter, along with other actions aimed at meeting general resource protection objectives. Among other things, these prescriptions would limit vehicular travel to designated routes. These prescriptions would also prohibit collection of artifacts. In addition, all proposed projects would be required to include a site inventory for historic resources, and appropriate strategies would be used to protect sensitive sites. This would include avoiding the site altogether, restricting access to the sensitive resource (i.e., construct barriers), interpreting the resource, rehabilitating the resource, or as a last resort, excavating and curating the resource.

The BLM would establish continuing collaborative programs with local communities, organizations, local and state agencies, Native American Indian communities, outfitters and guides, volunteers, and other interested parties. This would be done in order to identify, inventory, monitor, and develop and implement plans for the restoration, stabilization, protection, and/or interpretation of appropriate sites and resources within the Monument. The collaborative programs would include the continuation of the current Oral History Program in cooperation with local

communities. The Oral History Program focuses on the collection of histories from local residents and people knowledgeable about the region. It was created in order to document the history of the region and to increase understanding of the interactions between people and the environment of the Monument.

The BLM would use the information collected to create a better understanding of cultures and communities, join with the other sciences in interdisciplinary studies for improving land management practices, and work to showcase the histories of the local communities as part of the “long and dignified history” of the Monument.

## SOILS AND BIOLOGICAL SOIL CRUSTS

**“...Fragile cryptobiotic crusts, themselves of significant biological interest, play a critical role throughout the monument, stabilizing the highly erodible desert soils and providing nutrients for plants...”**  
(Proclamation 6920, 1996)

Conservation of soil resources is important, as soil, combined with water, provides the base of support for life within the Monument. Soils in arid and semiarid regions are particularly critical to sustaining ecosystems because they can be more vulnerable to degradation from a number of natural and artificially induced disturbances.

Often referred to as cryptobiotic, cryptogamic, microbiotic, or cyanobacterial-lichen soil crusts, biological soil crusts consist of lichens, mosses, and algae usually binding a matrix of clay, silt, and sand. Biological soil crusts are formed by living organisms and their by-products, creating a surface crust of soil particles bound together by organic materials (USDA, 1997). Biological soil crusts, which are widespread but not pervasive, play an important ecological role in the Monument in the functioning of soil stability and erosion, atmospheric nitrogen fixation, nutrient contributions to plants, soil-plant-water relations, seedling germination, and plant growth.

This Plan calls for Monument-wide prescriptions, such as limiting vehicular travel to designated routes and limiting facilities construction within the Monument boundary, which would help conserve soils. The BLM would apply procedures to protect soils from accelerated or unnatural erosion in any ground-disturbing activity, including route maintenance and restoration. The effects of activities such as grazing, mineral exploration, or water developments would be analyzed through the preparation of project specific National Environmental Policy Act (NEPA) documents. This process would include inventories for affected resources and the identification of mitigation measures.

Prior to any ground disturbing activity, the potential effects on biological soil crusts would be considered and steps would be taken

to avoid impacts on their function, health, and distribution. Long-term research toward preservation and restoration of soils would be part of the adaptive management framework (Appendix 3). Further research would be conducted on these crusts, and the results interpreted for management and education purposes.

## VEGETATION

**“...The blending of warm and cold desert floras, along with the high number of endemic species, place this area in the heart of perhaps the richest floristic region in the Intermountain West...”** (Proclamation 6920, 1996)

The blending of three floristic provinces in the Monument provides the potential for a high degree of plant diversity. Steep canyons, limited water, seasonal flood events, unique and isolated geologic substrates, and large fluctuations in climatic conditions have all influenced the composition, structure, and diversity of vegetation associations of this region. The potential is great for research on many aspects of these vegetation associations, and protection of these areas is a primary concern in the management of the Monument.

With this in mind, the Monument would be managed to achieve a natural range of native plant associations. Management activities would not be allowed to significantly shift the makeup of those associations, disrupt their

normal population dynamics, or disrupt the normal progression of those associations.

In addition to the above objective, the BLM would take measures to promote recovery and conservation of all special status plant species within the Monument (see the **Special Status Plant Species** section in this chapter ). The BLM would continue to consult with the United States Fish and Wildlife Service (USFWS) to ensure that actions authorized by the BLM do not jeopardize the continued existence of any Federally listed plant species or result in the destruction or adverse modification of critical habitats. Activities would occur in conjunction with the U.S. Forest Service, the Utah Division of Wildlife Resources' Natural Heritage Program, and the National Park Service in areas where species cross jurisdictional lines.

The BLM would place a priority on the control of noxious weed species and prevent the introduction of new invasive species in conjunction with Kane and Garfield Counties and the adjacent U.S. Forest Service and National Park Service units. Further, in keeping with the overall vegetation objectives and Presidential Executive Order 11312, native plants would be used as a priority for all projects in the Monument. A more detailed discussion of noxious weed control efforts and the native plant policy can be found later in this chapter.

The BLM would also continue to coordinate with other organizations to inventory the

Monument and evaluate the need for vegetation protection strategies. Such research would be coordinated as part of the implementation and adaptive management strategies outlined in Appendix 3, and the results would be interpreted for management and public education purposes.

In addition, a range of methods to manage visitor use and other activities would be used to protect vegetation associations in the Monument. Many of these prescriptions, including prohibiting the collection of plants and limiting vehicular travel to designated routes, are discussed later in this chapter, along with other actions aimed at meeting overall resource protection objectives. In addition, all proposed developments or surface disturbing activities would be required to include a site assessment for impacts to vegetation. Appropriate strategies would be used to avoid sensitive vegetation associations, and restoration provisions would be included in projects as described in the section on **Restoration and Revegetation** in this chapter.

Of particular interest in this area, as mentioned in the Proclamation, are relict plant communities, hanging gardens, and riparian resources. Sections that provide guidance on management of these resources specifically are included later in this chapter. Vegetation management activities or "tools," such as vegetation restoration methods (including management ignited fire), weed control, forestry product collection, reseeding after

fires, and restoration of disturbed areas, which are also directly related to accomplishing the vegetation objectives, are also discussed later in this chapter. As described in those sections, all vegetation management activities must be done in accordance with the objective of achieving a natural range of native plant associations.

## FISH AND WILDLIFE

**"...The wildlife of the monument is characterized by a diversity of species...Wildlife, including neotropical birds, concentrate around the Paria and Escalante Rivers and other riparian corridors within the Monument..." (Proclamation 6920, 1996)**

Within the boundaries of GSENM and surrounding areas, 362 species of vertebrate animals and 1,112 species of invertebrates have been identified. Given this diverse number of species, combined with the vastness of the Monument and other surrounding Federal lands, this area provides unique and relatively undisturbed habitat for wildlife. Having nearly entire ecosystems within its boundaries, the Monument remains a refuge and a place to learn about wildlife and associated habitats.

The Proclamation establishing the Monument states: "Nothing in this proclamation shall be deemed to diminish the responsibility and authority of the State of Utah for management of fish and wildlife, including regulation of hunting and fishing, on Federal lands within the Monument." At the same time, the Proclamation refers to the "outstanding

biological resources” and “important ecological values” in the Monument. These resources, which encompass entire natural systems, including fish and wildlife habitat, are among those that the BLM has been given responsibility to manage and protect. The BLM’s objective in managing habitat would be to work in conjunction with the Utah Division of Wildlife Resources (UDWR) in managing fish, wildlife, and other animals to achieve and maintain natural populations, population dynamics and population distributions in a way that protects and enhances Monument resources. The BLM would also work cooperatively with the UDWR to reestablish populations of native species to historic ranges within the boundaries of GSENM, and to take needed actions to protect and enhance the habitat of these native species.

An additional important objective of the BLM’s habitat management program would be to work with State, local, and Federal partners to minimize or eliminate the need for additional listing of species under the Endangered Species Act, and to contribute to the recovery of species already listed as such (see the **Special Status Animal Species** section in this chapter). The BLM would work cooperatively with the USFWS and the UDWR to fulfill these responsibilities and meet the requirements of FLPMA, the Endangered Species Act, and other laws and regulations governing fish and wildlife.

To meet the above objectives, the BLM would manage habitats for the recovery or reestablishment of native populations through collaborative planning with local, State and Federal agencies, user groups and interested organizations. The BLM would also work with the UDWR to meet the requirements of Executive Order 11312 on Invasive Species. The BLM would continue to work with the UDWR to meet the goals described in adopted species management plans. The BLM would place a priority on protecting riparian and water resources as they relate to fish and wildlife, and would work cooperatively with the U.S. Forest Service to coordinate maintenance of fisheries and flows. The BLM would also limit additional adverse impacts to crucial habitats on Monument lands from developments to preserve the integrity of wildlife corridors and migration routes and access to key forage, nesting, and spawning areas. A key component of this strategy is the placement of major visitor facilities outside the Monument, and restricting the number and extent of minor facilities in the interior of the Monument.

A range of methods to manage visitor use and other activities would be used to protect fish and wildlife and their habitats. Many of these prescriptions are discussed later in this chapter, along with other actions aimed at meeting general resource protection objectives. Among other things, these prescriptions would limit vehicular travel to designated routes, prohibit large developments within the Monument, and prohibit climbing

seasonally in areas sensitive for raptors. In addition, all proposed projects would be required to include a site assessment for impacts to fish and wildlife species. Appropriate strategies would be used to avoid sensitive habitat and restrict access to the sensitive habitats (i.e., construct barriers). Seasonal restrictions on visitor use could be implemented to protect crucial habitat and migration corridors. Water developments could be constructed for wildlife purposes if consistent with the overall objectives for fish and wildlife and with the water development policy discussed in the **Water-related Development** section of this chapter.

Given the fact that few comprehensive wildlife studies have been conducted on Monument lands, the BLM would continue to coordinate with the UDWR and other organizations to inventory for wildlife and to evaluate needs for habitat protection. Inventory and research efforts would be targeted to fill information gaps on habitat needs. Such research would be coordinated as part of the adaptive management framework discussed in Appendix 3.

Public education and interpretation would also be emphasized to improve visitor understanding of fish and wildlife species. Collaborative partnerships with volunteers and universities would be pursued to monitor and study biological resources consistent with the overall objective of protecting such resources.



**WATER**

**“...with scarce and scattered water sources, the monument is an outstanding biological resource...” (Proclamation 6920, 1996)**

The Proclamation establishing the Monument directs the Secretary of the Interior “to address in the management plan the extent to which water is necessary for the proper care and management of the objects of this Monument and the extent to which further action may be necessary pursuant to Federal or State law to assure the availability of water.”

**Water’s Role in The Protection of Monument Resources**

The Monument is vast and arid, but its “scarce and scattered water sources” are vital to a number of Monument resources. The landscape has been formed by water, its rock laid down in shallow seas or deposited by ancient streams and dune fields. Water continues to sculpt the rock, forming canyons and arches that characterize the area today. Water is also crucial to most biological resources within the Monument, including the communities of plants and animals associated with hanging gardens, seeps, springs, tinajas, and with ephemeral, intermittent, and perennial streams and ponds. Sensitive plant and animal species also rely upon scarce water resources, as do the riparian zones and entire natural systems that support those and other species. Water is also integral to the historic and prehistoric context of settlement patterns

in and around the Monument. A more detailed description of the need for water in the proper care and management of Monument resources can be found in Chapter 3 of the DEIS. In addition, the monitoring strategy described in the **Strategy For Assuring Water Availability** section below would further enhance knowledge of the extent water is necessary to support resources.

The water necessary for the proper care and management of Monument resources falls into two general categories: (1) water needed for Monument facilities to accommodate researchers and other visitors; (for campgrounds, sanitary facilities, and administrative purposes), and (2) water needed for the protection of the historic and scientific objects of the Monument and the natural processes associated with them.

For several reasons, it is the water in the second category that is challenging to identify, quantify, and protect. Water in this category is referred to generally as “instream flows,” and simply means allowing water as it naturally occurs in streams, seeps, springs, and other expressions of groundwater, and even precipitation, as one of the forces of nature, to continue to operate. The legal system of water law and water rights administration does not fully address that task. Precipitation generally becomes subject to the water law system only once it reaches a watercourse (typically defined as a stream or channel with an identifiable bed and banks), a groundwater aquifer, or is otherwise captured

or contained in such a way that it can be used to satisfy established water rights. Furthermore, high volume flood flows generally are not appropriated and reduced to a water right, unless there is an impoundment or similar mechanism in place to capture and store these high flows for later use. Finally, while it is possible to perfect water rights in instream flows for non-consumptive, ecological and related uses, certain limitations on that method exist, as explained below.

Water flows in the Monument can be or are already protected in most instances by means other than formal water rights of any kind. Specifically, nearly all of the land within the Monument is Federally owned, and the BLM has broad powers over how those lands are used. The BLM can exercise its land management authorities to protect water flows by simply not allowing construction of storage, diversion, or conveyance facilities on these lands, and in many situations this can be as effective in protecting Monument resources as securing formal rights to such flows.

The approval of a water appropriation application by the Utah State Engineer does not create a water right, only the right to try to place the water to beneficial use and thereby establish a water right. If the proposed point of diversion is on land not owned by the applicant, land use permission is a necessary element of placing the water to legal beneficial use. The Utah State Engineer commonly makes this point in approving appropriation applications. In one such recent instance, he said, “Also this

approval in no way grants right of trespass. Such rights-of-way are the responsibility of the applicant to obtain from the appropriate party.” (Memorandum Decision, In the Matter of Change Application Number 97-6 (a21081), August 6, 1998)

Where the proposed point of diversion is on Federal land, the land managing agency can decide whether to allow the diversion and any related conveyance structures to be located on its land. Particularly where the BLM (along with other Federal agencies managing adjacent Federal land) manages the upper reaches or headwaters of water courses, it can (subject to valid existing rights, including water rights) effectively prevent others from coming onto Federal land to construct facilities and establish new water rights that might interfere with the water needs of Monument resources.

Protecting water and water-dependent resources through land management means is less effective in situations where watercourses found in the Monument arise outside the Monument and flow into it, or in situations where there are private inholdings within the Monument. In these situations, absent an instream flow right, the BLM generally cannot exercise its land management authority to protect those water resources from diversion on non-Federal land, even if such diversions may interfere with Monument resources. This is also true, to some extent, where a BLM boundary crosses a groundwater aquifer (i.e., where part of an aquifer lies beneath Monument land and part underlies non-

Monument land). This can also occur where aquifers outside the Monument feed streams that flow into the Monument. It is questionable whether the BLM has any authority to prevent the pumping of groundwater from such aquifers (absent an instream flow water right), even though such pumping might interfere with water necessary for the protection of Monument resources.

### Strategy For Assuring Water Availability

The BLM may obtain appropriate water rights under Utah State law where the BLM meets Utah State law requirements. Campground, visitor, sanitary, and other administrative uses are clearly “beneficial uses of water” under Utah State law, for which water rights may be granted by the Utah State Engineer. Furthermore, none of the four administrative basins established by the Utah State Engineer has yet been closed to new appropriations because they are considered fully appropriated. Utah State law also allows the United States and the BLM, as the land owner/managing entity, to obtain such water rights in its own name, rather than the actual users (i.e., the visitors). Where water is needed for visitor facilities, the BLM may pursue this option.

Instream flows are another matter. Instream flow is important to a number of Monument resources, and its continued availability is necessary for their proper care and management. Our review to date strongly suggests, however, that both currently and into

the reasonably foreseeable future, sufficient water would continue to be available for these purposes. This is for several reasons. First, much of the water important to the Monument falls as precipitation within the Monument or on adjacent Federal lands, and is not subject to appropriation by others. Its continued availability for Monument resources can be safeguarded by appropriate Federal land management policies. Second, in those relatively few places where opportunities exist for appropriation under State law upstream from, or on private inholdings within the Monument, both current and reasonably foreseeable appropriations do not significantly threaten the continued availability of water in the Monument. Third, Federal law may already provide some protection, as discussed below.

For all these reasons, the BLM believes a sound strategy for assuring the continued availability of water for Monument resources is as follows:

**(1) Ensure that land management policies protect water resources.** Since much of the water important to the Monument falls as precipitation within the Monument, its continued availability can be ensured by appropriate land management policies within the Monument. The BLM would exercise its existing land management authorities to protect and maintain all available water and natural flows in the Monument. Several decisions described in later sections of this Plan are designed to meet this objective. These include the following:

- C Major visitor centers and facilities would be located outside of the Monument in local communities where there would be access to municipal water systems.
- C The need for water for visitor facilities within the Monument would be minimal because the only facilities provided would be a relatively small number of modest pullouts, toilets, parking areas, trailheads, and picnic sites. Most of these sites do not require water, including most toilet facilities which could use other technologies. In the limited cases where water is needed for a visitor facility, the acquisition of State appropriative water rights (discussed above) should be possible.
- C New water developments for other uses in the Monument (e.g., livestock, wildlife), could only be used when deemed to have an overall beneficial effect on Monument resources, including water sources and riparian areas. These developments could only be done where there is no other means to achieve resource protection objectives and only where the development would not jeopardize or dewater streams or springs.
- C Diversions of water out of the Monument would not be permitted. An exception to this policy could be made for local community culinary needs if the applicant could demonstrate that the diversion of water would not damage Monument resources or conflict with the objectives in the Approved Monument Management Plan.

**(2) Monitor to ensure water flowing into the Monument is adequate to support Monument resources.** The purpose of the above measures is to protect water that originates in the Monument or water after it enters the Monument boundary. While these measures are currently considered adequate to ensure the continued availability of water to support Monument resources, the BLM would also assess whether the water flows coming into the Monument continue to be adequate. This would be part of an overall strategy work to assess the status of water resources within the Monument. The BLM would work with the Water Resources Division of the U.S. Geological Survey, the Utah Department of Natural Resources, and others to gather comprehensive information concerning precipitation, surface water flows, and subsurface water flows into and out of the Monument. This would include establishing additional stream-gauging stations at selected locations, and continued inventorying of water sources such as seeps, springs, and wells. Established climate-data stations would be an integral part of the hydrologic monitoring network. Some of the main objectives of water resource investigations would include, but would not be limited to:

- C Conceptualizing the surface and ground-water systems, and their interactions at the regional (Monument) scale.
- C Subdividing the Monument into smaller-scale hydrologic “compartments” on the basis of hydrologic and geologic attributes.

Attributes, among others, could include surface-water drainage areas, aquifer systems, precipitation zones, hydraulic conductivity of surficial deposits and bedrock.

- C Cataloging and classifying hydrologic attributes of the compartments, and establish appropriate long-term monitoring programs to collect spring and stream discharge and water chemistry data.
- C Quantifying hydrologic processes such as surface-water and ground-water exchange, and precipitation, runoff, and sediment transport relationships within each compartment. In addition to new stream and spring monitoring stations, the existing network of climate stations would serve to gather appropriate data.
- C Determining direct and indirect effects of humans on hydrologic attributes of each compartment and subsequent effects on Monument resources.

Recognizing that all components of the strategy could not be implemented at once and that measures to protect water that originates in the Monument are currently considered adequate, the priority in such a data collection effort would be to collect data on flows entering the Monument. This would be done in order to ensure sufficient base and peak flows to support Monument resources.

**(3) Other options for assuring water availability, if needed.** At any point that the above data collection and assessment effort suggests that adequate water to protect

Monument resources is not entering the Monument, or that water is otherwise being depleted to the detriment of the Monument, other measures for assuring water availability would be taken. These measures include:

- C Cooperation with other Federal agencies that may already have Federal reserved water rights.
- C Initiation of discussions with the Utah State Engineer (Utah Division of Water Rights), Utah Division of Water Resources, and State and local water users to identify how nearby communities could secure water supplies for expected future growth without interfering with the water flows needed for Monument resources.
- C Other options are available to the BLM for assuring water availability. These options were discussed in detail in the DEIS. A summary of these options follows.

#### **Appropriate Water Rights Under State Law**

Under Utah State law, the only entities authorized to hold instream flow rights are the Utah Division of Wildlife Resources and the Utah Division of Parks and Recreation, and these entities have severe restrictions imposed on them in obtaining and holding such water rights. It may be possible to work out a cooperative agreement between the BLM and one of the State agencies authorized to acquire and hold an instream flow right, where the

State agency has a similar interest in protecting a particular resource, such as a state-listed sensitive species of fish or wildlife.

Another Utah State law option relies on Utah's version of the public interest doctrine. Under this doctrine, the Utah State Engineer has authority to deny a water right application, even if there is unappropriated water available, if he is convinced that the water would serve a more beneficial purpose by remaining in the channel (Bonham v. Morgan, 788 P.2d 497 Utah 1989). This authority stems from the provisions of Utah Code 73-3-1 and 73-3-8. The Utah State Engineer has, on occasion, implemented this authority by use of a formal, declared policy statement, as he did to prevent appropriation or use of endangered fish protection flows released from Flaming Gorge Reservoir, as part of the recovery plan for the endangered Colorado River native fishes. The BLM, in appropriate circumstances, can approach the Utah State Engineer with a request to use this authority to protect natural flows in the Monument in a similar manner.

In addition to the above, the BLM now holds a number of water rights within the Monument in support of its existing grazing program under the Taylor Grazing Act and in support of wildlife. If in the future any of the grazing water rights are no longer needed, they might be converted to wildlife rights after an appropriate proceeding to change the water right in the Office of the State Engineer.

#### **Federal Reserved Water Rights**

The Grand Staircase-Escalante National Monument Proclamation does not reserve water as a matter of Federal law. It does not, however, abolish or defeat the BLM's claims to Federal-law-based water rights under other reservations or proclamations. These are discussed below.

#### ***Public Water Reserves***

The Pickett Act of 1910 (repealed in 1976) vested the President with authority to withdraw and reserve certain public lands for public purposes (Act of June 25, 1910, ch. 421, 36 Stat. 847, as amended). Those purposes included preserving water resources on the public lands to serve the traveling public, including livestock. Courts have held that public water reserves do create Federal reserved water rights [see, e.g., U.S. v. Denver, 656 P. 2d 1 (S. Ct. Col. 1982) and U.S. v. Idaho, No. 23587 (S. Ct. Ida., April 6, 1998)], but these courts generally regard these water rights as limited to human and animal consumption. The water reserved under Federal law by these reservations may contribute to the care and management of Monument resources. Used in conjunction with appropriate land management decisions they may be helpful.

#### ***Wild and Scenic Rivers***

The nomination of a river through the planning process by itself creates no Federal reserved water right. The BLM has no authority of its

own to designate a Wild and Scenic River and thereby create such rights. Only Congress, or the Secretary of the Interior upon application of the Utah Governor, may designate a Wild and Scenic River within the Monument. Such a designation would, under established legal doctrine, reserve sufficient water to carry out the purposes of the designation, including instream flows.

### ***Congressional Reservation of Unappropriated Water***

Congress may expressly reserve any unappropriated water within the Monument necessary to preserve Monument resources. Such a reservation would be subject to valid existing rights and would have a very junior priority date; the date of the reservation of the water, not of the Monument itself, because the Proclamation establishing the Monument expressly did not reserve water. This means that the Monument would continue to be subject to all water rights on the system senior to its own water right, but would be protected from adverse effects arising from subsequent appropriations.

### ***Presidential Proclamation***

A reserved water right may be created by Presidential Proclamation under the Antiquities Act [*Cappaert v. United States*, 426 U.S. 128, (1976)]. If Monument needs for water cannot be met by other means, the President could amend the original Proclamation specifically to include water for

the purposes now identified by the BLM as necessary to protect Monument resources.

### **Assuring Water Quality**

Section 303(d) of the Federal Clean Water Act addresses water bodies and courses that are not "fishable, or swimmable." A 303(d) body of water is one that has been identified as possibly being in violation of State water quality standards. Section 303(d) requires each State to identify such waters and to develop total maximum daily loads (TMDL) for them, with oversight from the U.S. Environmental Protection Agency. The TMDL is a quantitative assessment of water quality problems, contributing sources, and load reductions or control actions needed to restore and protect bodies of water. The following list shows 303(d) waters within the Monument and their associated load problems [Utah Department of Environmental Quality (UDEQ), Utah Division of Water Quality (UDWQ), *Utah's 1998 303(d) List of Waters, Table 1-b*]:

- C Paria River (from Arizona State line to headwaters-tributaries -- total dissolved solids, sediment)
- C Escalante River (from Lake Powell to Calf Creek -- total phosphorous, sediment)
- C Escalante River (from confluence of Calf Creek to headwaters -- sediment)

- C Calf Creek (confluence with Escalante River to headwaters -- temperature, total dissolved solids, sediment)

In any case, the BLM would request that the State of Utah accelerate development of TMDLs for 303(d) waters in the Monument.

The State of Utah is currently engaged in a more intensive water quality monitoring program. Moreover, the BLM is currently developing a water quality monitoring program at 60 sites within the Monument, in conjunction with the UDWQ, to ensure that State and Federal water quality standards would be met. In addition, the BLM would develop a comprehensive water quality monitoring program for protection of Monument resources and for visitor safety. The BLM would continue to work with UDEQ/UDWQ as water quality improvement programs and TMDLs are developed.

Water quality monitoring would be implemented when ground disturbance or other factors could adversely affect water quality. Mitigation would be required if adverse effects were detected.

### **AIR QUALITY**

The existing air quality in and surrounding the Monument is typical of undeveloped regions in the western United States. Ambient pollutant levels are usually near or below the measurable limits. Exceptions include high, short-term

localized concentrations of particulate matter (primarily wind blown dust or smoke from wildland fires), ozone, and carbon monoxide. Locations vulnerable to decreasing air quality include the immediate operation areas around mining and farm tilling, local population centers affected by residential emissions, and areas affected by long-range transport of pollutants.

The entire management area has been designated as either attainment or unclassified for all pollutants and has also been designated as Prevention of Significant Deterioration (PSD) Class II. Nearby PSD Class I areas include Capitol Reef, Canyonlands, and Arches National Parks to the east and north, Bryce Canyon and Zion National Parks to the west, and Grand Canyon National Park to the south.

The Monument would continue to be managed as a Prevention of Significant Deterioration Class II area designated by the Clean Air Act. The BLM's objective with regard to air quality would be to ensure that authorizations granted to use public lands and that the BLM's own management programs would comply with and support local, State, and Federal laws, regulations, and implementation plans pertaining to air quality. All BLM actions and use authorizations would be designed or stipulated so as to protect air quality within the Monument and the Class I areas on surrounding Federal lands.

Site specific project proposals affecting BLM and adjacent lands would be reviewed for

compliance with existing laws and policies protecting the areas. Mitigation would be incorporated into project proposals to reduce air quality degradation. Projects would be designed to minimize further degradation of existing air quality. New emission sources would be required to apply control measures to reduce emissions.

Management ignited fires must comply with the State of Utah Interagency Memorandum of Understanding requirements to minimize air quality impacts from resulting particulates (smoke). This procedure requires obtaining an open burning permit from the State prior to conducting a management ignited fire.

## **ZONE MANAGEMENT DIRECTION**

### **ZONE DESCRIPTIONS**

Management zones are used in this Plan to display various management emphases, and are delineated by geographic area (Map 2.1 - in the envelop at the back of this document). These zones provide guidance to help define permitted activities and any stipulations pertaining to them, as well as any excluded activities. In this context, zones are tools that guide decision making on permitting visitor uses and other activities within the Monument.

The preferred alternative in the DEIS put forward a set of four management zones designed to manage visitation and direct economic opportunities to the adjacent

communities. In the development of the zones, the Planning Team performed a "conflict analysis" to determine if activities allowed within a certain zone would conflict with any sensitive resources within the zone. This analysis was used to draw zone boundaries so that higher use areas would avoid sensitive resources, especially where the impacts to the sensitive resource could not be avoided through other stipulations on use. These zones were further refined after consideration of public comment on the DEIS, direction from managers, and the application of the criteria described below. The zone boundaries portrayed on Map 2.1 may not exactly correspond to the on the ground geographic features. These differences are minor and do not change the intent of the zone management prescriptions.

The **Frontcountry Zone** (78,056 acres or 4 percent of the Monument) is intended to be the focal point for visitation by providing day-use opportunities in close proximity to adjacent communities and to Highways 12 and 89 which traverse the Monument. This zone would accommodate the primary interpretation sites, overlooks, trails, and associated facilities necessary to feature Monument resources. The zone boundaries were developed by locating a corridor along Highways 12 and 89, Johnson Canyon Road, and the portion of Cottonwood Canyon Road leading to Grosvenor Arch. The zone was then expanded or constricted to coincide with the dominant terrain features which would provide identifiable boundaries on the ground. Existing destinations such as

Grosvenor Arch, the Pahreah townsite, and the Calf Creek Recreation Area were included in order to provide for necessary improvements and to accommodate expected visitation. Lands close to Escalante were also included, due to extensive visitor use. In delineating this zone, Wilderness Study Areas (WSAs), threatened and endangered species habitat, relict plant areas, and other sensitive species were avoided whenever possible. Highway 89, from the western boundary to The Cockscomb, lacks dominant terrain to delineate this zone. For this reason, a one-mile buffer along each side of the highway was used.

The **Passage Zone** (38,316 acres or 2 percent of the Monument) includes secondary travel routes which receive considerable use as throughways and recreation destinations. The condition of the routes and distance from communities led the Planning Team to avoid directing or encouraging visitation, while at the same time allowing rudimentary facilities necessary to protect resources, educate visitors about Monument resources, or for public safety. The primary criterion for developing the zone boundaries was again dominant terrain. The boundary does not constrict closer than 100 feet to the routes, and encompasses most obvious imprints of human activities such as trailheads, transmission rights-of-way, and potential resource interpretation sites within ½ mile of the subject route. In many cases, dominant terrain was not available along route segments. In these cases, a 660 foot (1/8 mile) buffer was used. Again, WSAs, threatened and

endangered species habitat, relict plant areas, and other sensitive resources were avoided whenever possible. In addition, riparian areas were also avoided.

The **Outback Zone** (537,662 acres or 29 percent of the Monument) is intended to provide an undeveloped, primitive and self-directed visitor experience while accommodating motorized and mechanized access on designated routes. Facilities would be rare and provided only when essential for resource protection. This zone encompasses existing seedings, land treatments, and other known disturbed sites. The remaining public routes not in the Frontcountry or Passage Zones would be included in the Outback Zone. Dominant terrain was again the primary criterion for the zone boundary. The boundary does not constrict closer than 100 feet to the routes. WSAs were avoided wherever possible (see the **Wilderness Study Area** section of this chapter for a discussion of zone boundaries and WSA considerations).

The **Primitive Zone** (1,211,386 acres or 65 percent of the Monument) is intended to provide an undeveloped, primitive and self-directed visitor experience without motorized or mechanized access. Some administrative routes are included in this zone, which could allow very limited motorized access. Facilities would be non-existent, except for limited signs for resource protection or public safety. The zone is intended to facilitate landscape-scale research and therefore connects each of the three major landscapes (Escalante Canyons, Kaiparowits Plateau, and Grand Staircase), as

well as linking low elevation areas to higher elevations. This zone is also intended to connect primitive and undeveloped areas on surrounding lands managed by other Federal agencies.

## CAMPING

Camping in developed campgrounds or in designated primitive camping areas would be allowed in the Frontcountry and Passage Zones. Dispersed primitive camping would not be allowed in these zones. Dispersed primitive camping would be allowed in the Outback and Primitive Zones, but primitive camping could be limited to certain designated areas in these zones if resource damage occurs. Permits would be required for overnight use in all zones. Designated primitive camping areas are places where the BLM has identified and designated areas for camping use. These areas would not have any developments, other than a small sign or barriers to delineate the site.

Except in WSAs, threatened and endangered plant areas, relict plant areas, riparian areas, or other areas identified for resource protection, motorized or mechanized vehicles could pull off of designated routes no more than 50 feet for direct access to dispersed camping areas in the Outback Zone. Visitors would be encouraged to use existing disturbed areas for pulling off of routes to access camping areas and are required to leave existing vegetation intact. In the Frontcountry and Passage Zones, vehicles would be confined to using designated

pullouts and would not be allowed to pull off of the route.

Campfires would not be allowed in the Escalante and Paria/Hackberry Canyons, No Mans Mesa, and other relict plant areas as they are identified. Campfires would also be prohibited in archaeological sites, rock shelters, or alcoves Monument-wide. Fires would be allowed only in designated fire grates, designated fire pits, or mandatory fire pans in the Frontcountry and Passage Zones, and wood collection for campfires would not be permitted. In the Outback and Primitive Zones, fire pans would be encouraged and dead and down wood could be collected in areas where campfires are allowed.

### **CLIMBING**

Climbing would not be allowed in archaeological sites, on natural bridges or arches, or within identified threatened and endangered species nesting areas. Climbing areas may be seasonally closed to assure that disturbance to raptor nesting activities does not occur. The BLM would work with the public to identify climbing areas and develop specific management plans for them. Climbing would be subject to zone and other specific management restrictions.

### **COMMERCIAL FILMING**

Minimum-impact filming would be allowed in all zones if the activity complies with the zone requirements. Permits for commercial filming would include the following “minimum-

impact filming” requirements and may require preparation of a project-level NEPA document (BLM Manual 2920). Filming may not:

- C impact sensitive habitat or species
- C impact archaeological sites
- C involve use of explosives or major use of pyrotechnics
- C involve more than minimum impacts to land, air, or water
- C involve use of exotic plant or animal species with danger of introduction into the area
- C involve adverse impacts to sensitive resources including cultural or paleontological sites, sensitive soils, relict environments, wetlands or riparian areas
- C involve use of heavy equipment
- C involve use of vehicles off of routes
- C involve set construction
- C involve significant restriction of public access
- C involve significant use of domestic livestock
- C involve aircraft taking off, landing, or flying less than 1,000 feet above the site
- C involve 15 or more production vehicles, or 75 or more people, or exceed group size limitations
- C continue in excess of 10 days.

### **COMPETITIVE AND SPECIAL EVENTS**

No competitive events would be allowed. Special events may be approved, under permit, if the event meets other zone requirements. Events would be permitted in accordance with

the requirements of the most restrictive zone that the event encounters.

### **FACILITIES**

#### **Visitor Facilities in the Gateway Communities**

Development of visitor use facilities would be focused on the periphery of the Monument and within the communities. This would protect Monument resources, while providing economic opportunities in the communities surrounding the Monument.

Major facilities and the services associated with them would be located outside the Monument in nearby communities. These include a Monument headquarters in Kanab, an Interagency Office in Escalante, and visitor contact stations in Cannonville, Glendale, and Big Water. Their precise locations would be based on factors such as the availability of infrastructure; economic considerations, including market feasibility; the availability of financing; and managerial concerns. These determinations would be made by the communities and the BLM. Any construction activities associated with these sites are contingent upon funding by Congress. Monument staff would also be available at the Paria Contact Station and at the Anasazi State Park in Boulder. Within the Monument, visitor facilities would vary by zone, but in all zones, developed facilities would be limited as discussed below.



**Visitor Facilities in the Monument**

All facilities and signs would be consistent with the Monument Interpretive Plan, the Monument Facilities Master Plan, and the Monument Architectural and Landscape Theme, all in the process of development. The Monument Facilities Master Plan would address and be consistent with the Americans with Disabilities Act of 1973, the Rehabilitation Act of 1973, and the Architectural Barriers Act of 1968. All projects causing surface disturbance would be subject to NEPA analysis and the standard stipulations described in Appendix 4.

No projects or activities that would result in permanent fills or diversions in, or placement of permanent facilities on special flood hazard areas (as designated by the Federal Emergency Management Agency), would occur within the Monument. All facilities and parking areas would be designed to be unobtrusive and to meet the visual resource objectives discussed in the **Visual Resource Management** section of this chapter.

The provision of water at sites within the Monument would be very limited because the only facilities provided would be modest pullouts, parking areas, trailheads, picnic sites, toilets, and primitive camping areas. These sites do not require water, including most toilets which could use other technologies. Nonetheless, water may be provided in limited circumstances, where necessary for visitor safety or resource protection, in the Frontcountry or Passage Zones.

**Frontcountry Zone:** As the focal point for visitation, visitor day-use facilities and signs would be encouraged as necessary and adequate for visitor use, safety and the protection of sensitive resources, in addition to existing facilities. These facilities could include pullouts, parking areas, trailheads, trails, toilets, fences, and picnic areas. Day-use areas could include vault toilets, picnic tables, interpretive kiosks, and in some cases, interpretive trails which would be universally accessible, but not paved. Most day-use parking areas would be paved, but those off of unpaved roads, such as Grosvenor Arch and the Paria Movie Set, would remain unpaved. Most parking areas would be small, accommodating 10 to 20 cars. Construction of small spur routes or trails may be allowed to access parking areas or other facilities.

Scenic overlooks and other sites that have been developed along Highway 12 would be maintained. Some of the parking areas would be better delineated with barriers or fences to prevent further expansion. Additional wayside exhibits may be developed for some of the existing sites to stimulate further learning and protect resources. The BLM would look for appropriate opportunities to highlight Monument resources for along Highways 12 and 89, and around the communities of Boulder, Escalante, Henrieville, Cannonville, Tropic, Church Wells, and Big Water. The Monument staff would work with communities, visitors, and other interested publics to develop sites. Up to 15 of these sites could be developed in the Frontcountry Zone, and

specific projects would go through the NEPA process with full public involvement.

Calf Creek and Whitehouse Campgrounds are the only developed campgrounds in the Frontcountry Zone. Dispersed primitive camping would not be allowed, although up to 10 designated primitive camping areas (without amenities) may be identified for individuals or groups. Most of these would be designated in areas already used for camping. These areas could accommodate 2-5 vehicles with a few areas large enough for group camping. Camping areas would be designated with a small sign and barriers. Toilets, water, tables or other amenities would not be provided at these sites.

**Passage Zone:** The condition of routes and distance from communities in the Passage Zone makes it a secondary zone for visitation where facilities may occur, but visitation would not necessarily be directed or encouraged. Similar facilities as allowed in the Frontcountry Zone could be provided for resource protection, visitor safety, or for the interpretation of Monument resources. Most of the existing trailheads are located in this zone. Deer Creek Campground is also in this zone. Information kiosks approximately the size of two 3 foot by 5 foot panels would be located at major trailheads (e.g., The Gulch, Deer Creek, and Dry Fork), and smaller kiosks or signs would be located at less used trailheads. Rarely used

trailheads would be identified with a small sign.

Most of the existing parking areas would be better delineated with barriers to prevent further expansion. Parking areas could accommodate up to 30 vehicles, but most would be designed for fewer than 10 cars. Construction of small spur routes or trails may be allowed to access parking areas or other facilities. Trails and parking areas would not be paved.

Existing destinations such as Devils Garden and Dance Hall Rock would be maintained. A better delineated parking area and toilets could be considered for Dance Hall Rock. A fully accessible trail that blends in with the terrain could be considered for Devils Garden.

Up to 17 parking areas or pullouts (scenic overlooks) could be designated in this zone. These are generally areas that are already used for parking, and delineating them with natural barriers or fences would prevent further resource damage. Interpretive kiosks or signs could be provided at these sites as discussed above.

The existing Deer Creek Campground would be the only developed campground in this zone. Dispersed primitive camping would not be allowed, although up to 25 designated primitive camping sites may be identified for individuals or groups. Most of these would be designated in areas already used for camping. These areas could accommodate 2-5 vehicles

with a few camping areas large enough for groups. Camping areas would be designated with a small sign and barriers. Toilets, water, tables or other amenities would not be provided.

**Outback Zone:** In this zone small signs to educate the public about a particular resource or safety hazard may be installed at limited sites, but these sites would not be promoted in literature. Facilities such as designated parking areas, toilets, or fences could be allowed for protection of resources in limited cases, only where other tools to protect resources could not be used. Trails could be delineated if necessary to prevent widespread impacts from multiple trails. Dispersed primitive camping would be allowed in this zone, but certain areas could be closed and certain areas could be designated for camping (similar to the designated camping areas described for the Passage Zone) if resource damage is occurring.

**Primitive Zone:** In this zone, limited signs could be allowed for resource protection or public safety. Small directional signs may be needed, but these would be kept to an absolute minimum and would be rare. Trails could be delineated only if necessary to prevent widespread impacts from multiple trails. No water, toilets, or other visitor amenities or facilities would be provided. Dispersed primitive camping would be allowed in this zone, but certain areas could be closed and certain areas could be designated for camping (similar to the designated camping areas

described for the Passage Zone) if resource damage is occurring.

### GROUP SIZE

There would be no limit on group size in the Frontcountry Zone. Group size would be limited to 25 people in the Passage and Outback Zones. Permits for groups over 25 people would be considered in the Passage and Outback Zones, if the number of people and the activities proposed are consistent with the protection of Monument resources. Appropriate NEPA analysis would be prepared on areas where permits could be authorized. These permits would require that adequate sanitation and trash collection are provided, and that activities take place in areas where resources would not be damaged. In the Primitive Zone, group size would be limited to 12 people and 12 pack animals. Within the Paria River corridor in the Primitive Zone, permits could be approved for groups over 12 people up to a maximum of 25 people.

In order to protect Monument resources, it is possible that it would become necessary to place limits on the overall numbers of people and/or pack animals allowed, or to further restrict group sizes in areas where resource damage is occurring. See the **Recreation Allocation** section in this chapter for further discussion of limits on overall numbers of people.

## OUTFITTER AND GUIDE OPERATIONS

Outfitter and guide operations would be allowed throughout the Monument in compliance with the constraints of the zone and allocation and use limits. Training would be provided on an annual basis to keep outfitters and guides current on appropriate research studies occurring in the Monument. Outfitters and guides would be strongly encouraged to incorporate interpretive/educational components into their trips.

## RECREATION ALLOCATIONS

The Monument would use the following indicators to determine when and where visitor allocations need to be made: (1) resource damage (e.g., proliferation of campsites, human waste problems, social trailing or vandalism to historical, archaeological, paleontological sites, or destruction of biological soil crusts), (2) conflicts with threatened and endangered plant or animal species, and/or (3) the number of social encounters become unacceptable.

Rapid site backcountry inventories are currently underway to determine where and how many backcountry camping areas are in the Primitive Zone. The BLM plans to begin another inventory during the summer of 1999 to determine where and how many backcountry camping areas are located along transportation routes within the Monument. The rapid site inventories provide information that could be used in determining allocations

including whether camping areas, human waste, social trails, archaeological sites, paleontological sites, plant damage, cattle or signs of cattle are present or absent. Inventories of threatened and endangered species would also be used to determine allocations. Finally, a backcountry visitor use survey would be utilized to help determine a baseline tolerance for social encounters in known popular primitive areas.

These inventories, surveys, and studies would establish a baseline to set up an ongoing monitoring program and prioritize areas that require more restrictive management. This would be done as part of the adaptive management framework (Appendix 3) with consultation from the GSENM Advisory Committee. When it is determined that critical indicators have been approached or exceeded, the Monument would go through a public process to determine allocations for specific areas. Total numbers of people and group size would be considered. The BLM would consult with Glen Canyon National Recreation Area and the Escalante Ranger District of Dixie National Forest if allocation is determined necessary for the Escalante Canyons.

The Monument would work closely with the UDWR throughout the public process as they administer and regulate hunting, fishing and the permits issued for these activities.

**Frontcountry:** This zone would be the focal point for visitation. There would be no allocation in this zone other than directing

individuals to selected sites chosen for their interpretive values.

**Passage:** Allocation is possible for the protection of sensitive resources or visitor experience. The most likely places that allocation would occur is at trailheads in order to limit the number of people accessing the primitive areas.

**Outback:** Allocation is moderately likely for the protection of sensitive resources or visitor experience. The first step would be designating primitive camping areas. Limiting the number of people in specific areas could also be used after other measures were taken.

**Primitive:** Allocation is highly likely for the protection of sensitive resources or visitor experience. Based on current visitor use and the inventories and studies listed above, it is anticipated that allocations could be needed for the Escalante Canyons, Fiftymile Mountain, and Hackberry Canyon as soon as 2001. Additional areas meeting the criteria would also be considered.

In developing allocation plans for areas, efforts would be made to coordinate with other resource planning efforts (e.g., research, grazing allotment management plans), as discussed in the **Implementation and Adaptive Management Framework** in Appendix 3. This type of integrated activity planning would lead to more comprehensive planning efforts for specific areas and to better decision making.

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**RECREATIONAL STOCK USE**

Horses or other pack animals would not be allowed in relict plant communities, archaeological sites, rock shelters, or alcoves. Sheep species would not be allowed for pack use Monument-wide. Recreational stock are limited to 12 animals in the Primitive Zone. The BLM requires that all hay used on BLM lands be certified weed free.

**TRANSPORTATION AND ACCESS****Public Access**

The unregulated use of off-highway vehicles (OHV), also called all-terrain vehicles (ATV), including snowmobiles, off of designated routes has the potential to damage Monument resources and cause recreation conflicts. Cross-country vehicle travel can damage Monument objects associated with these resources which are sensitive to surface disturbance. Resources sensitive to this disturbance include archaeological, paleontological, geological, historic, biological soil crusts, special status plant and animal species, vegetation, and wildlife. Additionally, OHV tracks can become ruts. These ruts concentrate water flows, altering water quality and quantity and creating erosion. Some wildlife and special status wildlife species are sensitive to the presence of OHVs and may leave calving and fawning areas, roosts and nests, or other critical habitat. Likewise, OHVs conflict with primitive recreation experiences by introducing the sights and sounds of civilization. For these

reasons, cross-country motorized travel would be prohibited in accordance with 43 CFR 8340 Off-Road Vehicle regulations. Use on designated routes is provided however. To this end, OHV designations in the Monument would be either “closed” (in the Primitive Zone) or “limited to designated routes” (in the Frontcountry, Passage, and Outback Zones) (Map 2.1). These designations are consistent with standard BLM designations provided for in BLM Manual 8340. As discussed in the **Camping** and **Forestry Products** sections in this chapter, vehicles may pull off of routes no more than 50 feet for parking and camping in the Outback Zone, except where prohibited. No off-highway vehicle (OHV/ATV) play areas would be designated in the Monument.

Bicycle use (including mountain bikes and road bikes) was also carefully considered as part of the overall transportation system. Impacts from bicycles may be lower than OHVs due to ability of OHVs to travel over greater distances in a short period of time. Use areas may also differ due to different ground surface requirements (e.g., sand often discourages mountain bike use, while it can be desired by OHV users). However, impacts from the use of OHVs and bicycles are similar. Mountain bike travel can cause damage to resources sensitive to surface disturbance, particularly biological soil crusts, special status plant species, and other vegetation. Additionally, bicycle tracks can also become ruts. These ruts, like those of OHVs, can concentrate water flows, altering water quality and quantity and creating erosion. Therefore, use of bicycles is also limited to

designated routes and cross-country travel is not allowed.

This Plan would designate the route system for the Monument, subject to valid existing rights.<sup>1</sup> Although the BLM had not originally planned to make access decisions in the Monument Management Plan, the agency was persuaded, as a result of widespread requests in the scoping process and further examination, that proper management of the Monument would be enhanced by making decisions on access and transportation routes in the Plan. The transportation map (Map 2.1) shows routes that would be open for public use and those available for administrative use only (see the **Administrative Routes and Authorized Users** section in this chapter for further discussion). The specific routes shown open for public use are based on a variety of considerations including what is needed to protect Monument resources, implement the planning decisions, and provide for the transportation needs of surrounding communities. The basic philosophy in determining which routes would be open was to determine which routes access some destination (e.g., scenic overlook, popular camping site, heavily used thoroughfare) and present no significant threat to Monument resources. These routes would be open for public use. Routes that were not considered necessary or desirable (for resource protection purposes) would not be kept open for public access. The DEIS presented a range of transportation alternatives, and public comments on those transportation

options were considered in crafting this transportation plan. As part of developing an access system for this Plan, the BLM sought to reach an agreement with Kane and Garfield Counties resolving the many issues surrounding rights-of-way and access in the Monument. At the time this Plan was sent to the printer, negotiations had not reached a conclusion. Comments from the Counties were considered in this Plan, however.

Street legal motorized vehicles, including four-wheel-drive and mechanized vehicles (including bicycles), would be allowed on 888 miles of routes designated open in the Frontcountry, Passage, and Outback Zones (Map 2.1). In order to display all open routes, this mileage number includes sections of Highways 12 and 89 within the Monument, even though they are not administered by the BLM. No routes would be designated open in the Primitive Zone.

Non-street legal all-terrain vehicles (ATVs) and dirt bikes would be restricted to those routes designated as open for their use. Non-street legal ATVs and dirt bikes would be allowed on 543 miles of the 888 miles of routes designated open to street legal vehicles in the Frontcountry, Passage, and Outback Zones; no routes would be designated open to them in the Primitive Zone. All zones would allow hikers, horses, and pack animals, except where noted elsewhere to protect resources.

### **Maintenance**

With the exception of those segments listed below, open routes could be maintained within the current disturbed areas; no widening, passing lanes, or other travel surface upgrades could occur. Deviations from the current maintenance levels would be allowed as follows (subject to Wilderness Study Area Interim Management Policy, BLM Manual H-3550-1):

- C Hole-in-the-Rock Road: Allow stabilization of washout prone areas, primarily along the southeastern end, to prevent erosion and sediment loading in drainages.
- C Smoky Mountain Road: Allow stabilization in the Alvey Wash section to prevent erosion and sediment loading in drainages.
- C Cottonwood Wash Road: Allow stabilization of washout prone areas, primarily along the southern section, to prevent erosion and sediment loading in drainages.
- C Skutumpah Road: Allow new crossing for safety at Bull Valley Gorge, and stabilization of washout prone areas, primarily along the northern section, to prevent erosion and sediment loading in drainages.

In the event that Title 5 rights-of-way are issued pursuant to negotiations with Kane and Garfield Counties, or in the event of legal decisions on RS 2477 assertions, maintenance

activities would be governed under the terms of those actions.

The BLM would continue to work with the Utah Department of Transportation (UDOT) concerning route maintenance for Highways 12 and 89. This would cover maintenance and safety work activities. Any new ground disturbance would require site-specific environmental analysis.

### **Trails**

In the Frontcountry Zone, a full range of trails could be developed and maintained in order to provide opportunities for visitors. The BLM would work with UDOT to explore the possibility of developing bicycle lanes or parallel bicycle routes along Highways 12 and 89. In the Passage Zone, trails could be developed and maintained where needed for protection of Monument resources or for public safety. Elsewhere, trails could only be developed or maintained where necessary to protect Monument resources.

The Great Western Trail is proposed to traverse the Monument in the Grand Staircase section. The BLM is currently working with adjacent agencies to select an appropriate route through the Monument that is consistent with the objectives in this Plan. The route currently identified would be on existing routes designated open to ATVs in this Plan. This process may require further NEPA analysis.

### **Administrative Routes and Authorized Users**

The BLM would be responsible for administrative routes which would be limited to authorized users. These are existing routes that lead to developments which have an administrative purpose, where the BLM or some permitted user must have access for regular maintenance or operation. These authorized developments include such things as powerlines, cabins, weather stations, communication sites, spring developments, corrals, and water troughs. Routes designated open for certain administrative purposes (192 miles) are shown on Map 2.1. Access would be strictly limited and would only be granted for legitimate and specific purposes. Maintenance would be the minimum required to keep the routes open for limited use by high clearance vehicles. If the administrative purpose were to cease, the route would be evaluated for closure following public notification and opportunity to comment. Authorized users could include grazing permittees, researchers, State or Federal agencies, Native American Indians accessing recognized traditional cultural properties, and others carrying out authorized activities under a permit or other authorization.

Beyond the routes shown on Map 2.1, the BLM would work with any individual operating within the Monument under existing permits or authorizations to document where access must continue in order to allow operation of a current permit or authorization. Routes that go only to BLM range monitoring

and study areas would not be maintained, but periodic vehicular access to these sites would be granted for required range monitoring uses.

### **Road Restoration Strategy**

The BLM's strategy for closing routes that would no longer be available for public or administrative use in the Monument would be phased over a period of years. This would be accomplished as rapidly as funding permits. It is anticipated that this could take as many as ten years. Each year, a percentage of the Monument's base budget would be used to close routes in areas that are easily accessible to the public and that involve sensitive resources in immediate danger of being degraded. Generally, routes in the Frontcountry and Passage Zones would be closed first. However, there may be routes in the Outback and Primitive Zones that would be considered on a case-by-case basis.

As soon as this Plan is formally approved, these routes would be considered closed. The proposal for restoration would include:

- C not repairing washed out routes
- C natural barriers, such as large boulders
- C dead and down wood to obscure route entry ways
- C fences
- C ripping up the route bed and reseeding with vegetation natural to that area
- C replacing gates with a fence if area has a fence in place
- C visitor education and information

Each route would be looked at individually, and the best, least intrusive method would be used based on the geography, topography, soils, hydrology, and vegetation. The first several hundred feet of select routes identified for closure could be left open to provide pull-out areas or camping opportunities, preventing new ground disturbance elsewhere.

### **Enforcement**

The BLM's strategy to keep vehicles on designated travelways would be to hire additional staff including law enforcement personnel to patrol by foot, horse, and vehicle. The BLM would be proactive in educating the public about routes that are open with maps and signs. The information would be on the Monument website, at the visitor centers/contact stations, and sent to the media. The BLM is pursuing cooperative agreements with the Sheriff departments in Kane and Garfield Counties to facilitate shared law enforcement and support for enforcing established closures. The BLM would continue to work with the counties, the State, the communities, and others to communicate correct information to the visiting public and residents. An extensive volunteer program that would assist in educating visitors about the Monument would also be developed.

Monument staff would be scheduled to patrol on a regular basis throughout the year. Additional patrols would be added for intense use periods.

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**Aircraft Operations**

Congress has delegated monitoring and control of the National Airspace System to the Federal Aviation Administration (FAA). At the present time, airspace over the Monument is subject to numerous aviation regulations designed to establish a safe operating environment for all aircraft.

The Department of Defense operates two Military Training Routes across the Monument. These routes (IR-126 and IR-266) include both fighter aircraft and heavy bombers. Their operating altitudes can vary from the surface, using terrain-following radar, up to 9000 feet Mean Sea Level. The route width varies from 2 to 4 miles on either side of the centerline. These routes have been in use for many years, and are active year-round. They were established in part because of the lack of human settlement in the region. The existence of these military training routes would be included in visitor information materials, which would tell visitors in the affected areas to expect military aircraft operations. The BLM intends to work cooperatively with the Department of Defense to ensure that military training routes are appropriate to Monument management.

A number of air tour operators are located in close proximity to the Monument in locations such as Bryce Canyon, Kanab, St. George, Page, and Las Vegas. These operators charter tours over the Monument upon request. The BLM would work cooperatively with aircraft operators, adjacent land managing agencies,

and the FAA to direct overflights to appropriate management zones.

The only active airstrip inside the Monument is the New Home Bench airstrip near Boulder, which is located partially on U.S. Forest Service and partially on BLM lands. The BLM is cooperating with the U.S. Forest Service in the issuance of a Special Use Permit for operation of the airstrip. In order to protect Monument resources, aircraft takeoff and landings would be allowed only at the New Home Bench airstrip.

A number of entities holding rights-of-way or permits, State agencies, and the BLM use aircraft for patrolling, monitoring, maintenance, and repair functions. Necessary aircraft operations for rights-of-way holders, permittees, and other agencies would be documented in the appropriate permit, authorization or a Memorandum of Agreement. Landing of aircraft for these purposes would be limited to the minimum necessary to meet the required maintenance or repair function.

Due to the remote and undeveloped character of the Monument, natural ambient sound is considered by the public to be an extremely important component of the resource and the visitor experience. Studies on the effects of noise utilizing both visitor surveys and sound measuring instruments would be completed to determine what the noise baseline is for various areas within the Monument. Studies would be coordinated for areas that border adjacent National Parks.

**UTILITY RIGHTS-OF-WAY AND COMMUNICATION SITES**

Monument managers are committed to working with nearby communities and other land management agencies to pursue management activities which cooperatively accomplish the objectives of each agency within the constraints of Federal law. The BLM would work in cooperation with local communities and utility providers to identify short and long-term community needs for infrastructure which could affect Monument lands and resources. Community projects which require public lands access or use would be subject to necessary project level NEPA analysis. The BLM would work with the sponsor of a project to meet Monument Plan objectives for protecting resources. Alternative locations for projects would be identified when unavoidable conflicts arise. In order to protect Monument resources, such projects would be focused in appropriate zones as discussed below.

In general, proposals for diverting water out of the Monument would not be permitted as discussed previously in this chapter in the **Water** section. However, exceptions could be considered for local community culinary needs if the applicant could demonstrate that the diversion of water would not damage Monument resources or conflict with the objectives in the Approved Monument Management Plan.

In the Frontcountry and Passage Zones, communication sites and utility rights-of-way would be allowed, but would have to meet visual resource objectives described in the **Visual Resource Management** section of this chapter. In the Outback Zone, communication sites and utility rights-of-way would be allowed within the constraints of the zone, where no other reasonable location exists, and would meet the visual objectives described in the **Visual Resource Management** section of this chapter. In the Primitive Zone, utility rights-of-way would not be permitted. In cases of extreme need for local (not regional) needs and where other alternatives are not available, a plan amendment could be considered for these facilities in the Primitive Zone. Communication sites would only be allowed in the Primitive Zone for safety purposes and where no other alternative exists.

### Rights-of-Way

The following criteria apply to the management of all rights-of-way in the Monument where they are allowed:

1. Bury new and reconstructed utility lines (including powerlines up to 34.5 kilovolts) unless: visual quality objectives can be met without burying; geologic conditions make burying infeasible; or burying would produce greater long-term site disturbance.
2. All reconstructed and future powerlines must meet non-electrocution standards for raptors. If problems with existing

powerlines occur, corrective measures would be taken.

3. Construct all powerlines using non-reflective wire. Steel towers would be constructed using galvanized steel. Powerlines would not be high-lined unless no other location exists.
4. Strobe lights would not be allowed at any communication site. Other methods would be used to meet aircraft safety requirements.
5. Communication site plans would be prepared for all existing sites before any new uses or changes in use occur.
6. A Monument-wide feasibility study would be prepared to determine the most appropriate location(s) for new communication sites.

There are two utility line projects proposed in the Monument at this time; the upgrade of PacifiCorp's Cottonwood Canyon powerline from 230-kilovolts to 345-kilovolts, and the Lake Powell to Sand Hollow Reservoir water pipeline. In December of 1975, Utah Power and Light (a subsidiary of PacifiCorp) filed an application to increase the voltage in their Cottonwood Canyon powerline from 245-kilovolts to 345-kilovolts. The proposal was to raise the cross arms 5 feet on the existing wood towers, add three insulators to each conductor, bundle the conductors, and add one X-brace to each existing tower for increased support. At the request of the applicant, this project was put on hold.

No application has formally been filed for the Lake Powell to Sand Hollow water pipeline. However, the tentative route would follow Highway 89 for most of its length. Per Public Law 105-355, signed by President Clinton on October 31, 1998, a utility corridor was designated along Highway 89 in Kane County, including that portion of Highway 89 within the Monument. The utility corridor extends 240 feet north from the center line of the highway, and 500 feet south from the center line of the highway. Location of the proposed water pipeline within this utility corridor is a possibility.

In any case, subsequent environmental analysis would be required on both the powerline upgrade proposal, and the water pipeline proposal. A determination as to their conformance with the Approved Plan would be required.

In general, the BLM would authorize only one access route to private land parcels unless public safety or local ordinances warrant additional routes. Private land owners would be required to coordinate the development of access routes across public lands in order to prevent a proliferation of routes. Rights-of-way may be allowed when necessary to exercise valid existing rights.

### VENDING

Vending within the Monument would be occasional, infrequent, and could be allowed by permit only on a case-by-case basis in the Frontcountry and Passage Zones, in



association with approved special events or recreation sites. Generally, permits could be issued to provide services needed at recreation sites (such as firewood sales at campgrounds) and services that are commonly offered in conjunction with permitted special events. Criteria to protect Monument resources would be included in all permits. Concessionaire sales and on-going vending permits are not included in this provision, except where contracts between concessionaires and the Monument are used to provide services to visitors in the Frontcountry and Passage Zones. Vending would not be allowed in the Outback or Primitive Zones.

The BLM would work with UDOT to regulate vendors along Highways 12 and 89.

## MANAGEMENT ACROSS ZONES

### COLLECTIONS

In order to carry out the intent of the Proclamation to protect historic and scientific objects, collection of Monument resources, objects, rocks, petrified wood, fossils, plants, parts of plants, animals, fish, insects or other invertebrate animals, bones, waste, or other products from animals, or of other items from within the Monument would be prohibited. Exceptions could include: collections authorized by permit in conjunction with authorized research or management activities; the collection of small amounts of fruits, nuts, and berries for personal, non-commercial use; the collection of certain natural materials by Native American Indians under BLM permit;

the collection of antlers or horns as provided for by UDWR regulations; and the collection of dead and down wood for immediate use in campfires, where campfires are allowed.

The above prohibitions shall not be deemed to diminish the responsibility and authority of the State of Utah for management of fish and wildlife, including the regulation of hunting and fishing, on Federal lands within the Monument.

### EMERGENCY AND MANAGEMENT EXCEPTIONS

As discussed in the **Transportation and Access** section of this chapter, motorized and mechanized vehicles are generally limited to designated routes, except as provided for in the **Camping** and **Forestry Products** sections of this chapter. In emergency circumstances, however, vehicles may pull immediately off of designated routes.

In addition, limited exceptions to the general management provisions may be granted by the Monument Manager. These exceptions could allow off-highway vehicle use, aircraft landing, motorized or mechanized access on closed routes, or use of mechanized equipment in closed areas. Exceptions would be made in emergencies, or where clearly essential to serve Monument management purposes. Exceptions could be made in cases such as carrying out search and rescue operations, fire prevention and control, and other uses where justified. Certain authorized users could be given motorized access not given to the general

public for specific, authorized uses as described in the **Administrative Routes and Authorized Users** section in this chapter.

### FEES

The Monument has been approved to develop a fee demonstration program. Public input would be sought prior to the design and implementation of any fee system. Existing use fees would continue to be charged.

### FENCES

Fences would be used in certain circumstances to protect Monument resources, to manage visitor use, and to manage livestock, consistent with the Proclamation. They would be designed and constructed in accordance with visual resource management objectives and the Monument Facilities Master Plan (see the **Visual Resource Management** section of this chapter for further discussion).

### IMPLEMENTATION AND ADAPTIVE MANAGEMENT FRAMEWORK

While this Plan contains general direction and context for the entire Monument and makes decisions on specific actions for some issues (e.g., access restrictions), many management actions necessary to achieve broad-scale objectives (e.g., achieving a natural range of native vegetation associations) may require further analysis

and additional planning. The **Implementation and Adaptive Management Framework** outlined in Appendix 3 describes the expected types and levels of analysis and planning that would “step-down” broad-scale information and decisions in this Plan to site-specific actions. Appendix 3 also provides a framework for developing a specific monitoring and evaluation program which would measure the conditions and trends in the Monument. The information developed through the monitoring process would be used to assess management strategies and then alter decisions, change implementation, or maintain current management direction as appropriate.

## LIVESTOCK GRAZING

The Presidential Proclamation establishing the Monument addressed livestock grazing with the following statement: “Nothing in this proclamation shall be deemed to affect existing permits or leases for, or levels of, livestock grazing on Federal lands within the monument: existing grazing uses shall continue to be governed by applicable laws and regulations other than this proclamation.”

There is a substantial body of law and regulation governing grazing on public lands. In addition, the Utah State Director for the BLM has developed Standards for Rangeland Health and Guidelines for Grazing Management which were approved by the Secretary of the Interior on May 20, 1997 (Appendix 5). The Utah Standards and Guidelines apply to grazing management statewide, including those lands within the Monument.

This section describes how grazing uses within the Monument shall be managed, in keeping with applicable laws and regulations, and with the statewide Standards and Guidelines. It describes a process for grazing management and a schedule for completion of this process Monument-wide.

### Applicable Statutes and Regulations

The management of grazing on public lands in the United States began in 1934 with the passage of the Taylor Grazing Act (TGA), which established a strategy for grazing management. This strategy was amended in 1976 when Congress enacted FLPMA, which made fundamental changes to the management of public lands overall, including grazing management.

Under FLPMA, public lands are to be managed under the principles of multiple use and sustained yield, unless otherwise specified by law. The Act defines “multiple use” as:

“...the management of the public lands and their various resource values so that they are utilized in the combination that would best meet the present and future needs of the American people; making the most judicious use of the land for some or all of these resources or related services....; the use of some land for less than all of the resources; a combination of balanced and diverse resource uses that takes into account the long-term needs of future generations for renewable and nonrenewable resources, including, but not limited to, recreation, range, timber,

minerals, watershed, wildlife and fish, and natural scenic, scientific, and historic values; and harmonious and coordinated management of the various resources without permanent impairment of the productivity of the land and the quality of the environment, with consideration being given to the relative values of the resources and not necessarily to the combination of uses that would give the greatest economic return or the greatest unit output.” [43 USC Section 1792(c)]

FLPMA also established the policy that public lands are to “be managed in a manner that would protect the quality of scientific, scenic, historic, ecological, environmental, air and atmospheric, water resource, and archaeological values; that, where appropriate, would preserve and protect certain public lands in their natural condition; that would provide food and habitat for fish, wildlife, and domestic animals; and that would provide for outdoor recreation, human occupancy, and use.” [43 USC Section 1702 (a)(8)]

In addition to complying with the TGA and FLPMA, the BLM must comply with several other laws that affect the range management program. These include the Public Rangelands Improvement Act of 1978, the Wild Free-Roaming Horses and Burros Act of 1971, the Endangered Species Act of 1973, the National

Environmental Policy Act of 1969, and the Clean Water Act of 1972.

Grazing regulations were first promulgated pursuant to the Taylor Grazing Act. Before 1946, when the BLM was established, the Grazing Service assigned grazing privileges to landowners who historically grazed livestock on public rangelands. This was a complex and contentious process in which use areas, grazing levels, season-of-use, grazing fees, and base property qualifications were established. In subsequent years, the BLM refined the grazing regulations to incorporate new legislation and administrative initiatives. The regulations (Grazing Administration, exclusive of Alaska) are found in Volume 43 of the Code of Federal Regulations (CFR), Part 4100.

The BLM's grazing regulations were revised in August 1995. A new subpart directed each BLM State Director to develop "Standards and Guidelines for Grazing Administration." A Standard is a minimum resource condition to be achieved on BLM lands, and a Guideline is an acceptable or best management grazing practice that would be applied in order to achieve the Standards. In Utah, the State Director developed the Standards and Guidelines in consultation with the statewide Utah Resource Advisory Council. The Secretary of the Interior approved the "Standards for Rangeland Health and Guidelines for Grazing Management for BLM Lands in Utah" on May 20, 1997. Local plans and decisions may be more detailed than the Utah Standards and Guidelines, but must be in

conformance with the Standards and be consistent with the Guidelines.

### **Grazing Management Process**

Within the Monument, the following process would be followed so that grazing management conforms with the grazing regulations and Utah's Standards and Guidelines. In this process, each grazing allotment would be assessed, and new allotment management plans would be developed, consistent with the BLM-wide grazing permit renewal process.

#### ***Step 1: Assessment***

All allotments (see Appendix 6 for allotment descriptions and map) would be assessed in accordance with the guidelines and guidance issued by the BLM. All available data would be used to make an overall assessment of rangeland health, including ecological processes, watershed functioning condition, water quality conditions, special status species, and wildlife habitat conditions for each allotment, as described in the Utah Standards for Rangeland Health, in light of the Fundamentals of Rangeland Health at 43 CFR § 4180.1.

Priorities for completing the assessments and implementing needed changes would be set using the following criteria:

- C presence of values that are regulated by operation of law such as water quality, threatened and endangered or sensitive plant and animal species

- C areas at high risk of becoming degraded, or high public interest areas
- C permit renewal schedule

#### ***Step 2: Determination of Rangeland Health and Evaluation of Existing Grazing Management***

The authorized officer (GSENM Manager) shall determine rangeland health for each allotment according to the Utah Standards and Guidelines for Grazing Administration, in light of the Fundamentals of Rangeland Health. The GSENM Manager determines whether or not assessment results show that each allotment is achieving or making significant progress toward the Utah Standards.

To the extent any assessment result is found to be inconsistent with the Standards, the GSENM Manager shall determine whether or not existing livestock grazing practices or levels of use are significant factors in such inconsistency. The GSENM Manager shall take appropriate action under 43 CFR Subparts 4120, 4130, and 4160 as soon as practicable, but not later than the start of the next grazing year, upon determining that existing grazing management practices or levels of grazing on public lands need to be modified to conform with Utah Standards and Guidelines.

### ***Step 3: Develop Allotment Management Plans***

The compatibility of grazing with other land uses would be evaluated in allotment management plans (AMP), and the results of the evaluation would be consistent with all applicable legal authorities, including FLPMA, the TGA, the Public Rangelands Improvement Act, 43 CFR Part 4180, Utah Standards and Guidelines, and National Wildlife Federation v. BLM, 140 Interior Board of Land Appeals (IBLA) 85 (1997). AMPs may be developed on an individual basis, or may be developed for a group of allotments where similar ecosystems or land uses exist. These AMPs may include integrated activity planning, addressing a range of non-grazing issues within the plan area.

### **Mandatory Content For AMPs**

In addition to all other applicable legal authority, all AMPs shall be prepared in accordance with 43 CFR § 4120.2, and shall ensure that the following conditions exist:

1. Watersheds are in, or are making significant progress toward properly functioning physical condition. This must include their upland, riparian-wetland, and aquatic components. Soil and plant conditions must support infiltration, soil moisture storage, and the release of water that are in balance with climate and landform, and must also maintain or improve water quality, water quantity, and timing and duration of flow.

2. Ecological processes, including the hydrologic cycle, nutrient cycle, and energy flow are maintained, or there is significant progress toward their attainment in order to support healthy biotic populations and communities.
3. Water quality complies with State water quality standards, and achieves or is making significant progress toward achieving established BLM management objectives such as meeting wildlife needs.
4. Habitats are, or are making significant progress toward being restored or maintained for Federal threatened and endangered species, Federal candidate species, and other special status species.

Allotment management plans shall designate lands that are available for livestock grazing. Grazing permits or leases shall specify the types and levels of use authorized, including livestock grazing and suspended use.

No allotments would be converted from cows and horses to domestic sheep within at least a 9 mile buffer of bighorn sheep habitat, except where topographic features or other barriers prevent physical contact. This is in order to prevent the spread of disease from domestic sheep to desert bighorn sheep. Other BLM guidelines or policy in regard to domestic and wild stock interactions would also apply.

Regarding conservation use, on September 1, 1998, the U.S. Court of Appeals for the Tenth Circuit decided Public Lands Council v. Babbitt, 167 F.3d 1287 (10th Circuit 1999). The case resolved the Government's appeal of

an adverse U.S. District Court order enjoining the application of four separate grazing provisions in 43 CFR Part 4100. The Court of Appeals reversed the District Court's order on three of the four provisions. The only grazing provisions now enjoined are those providing that "conservation use" is a permissible use for a grazing permit.

AMPs would include a monitoring program in conjunction with the adaptive management framework (Appendix 3). The monitoring program would be designed to periodically observe and collect data to evaluate the effects of management actions prescribed in the AMP, and to evaluate the effectiveness of those actions in:

- C meeting the management objectives stated in the AMP;
- C achieving the conditions described as the Fundamentals of Rangeland Health (43 CFR 4180.1);
- C meeting the Utah Standards for Rangeland Health, as indicated by the factors described therein; and
- C ensuring that grazing use is not causing unacceptable resource degradation.

**Optional Content for AMPs*****Grass Bank Allotments/Pastures***

The BLM's grazing regulations provide for increasing and decreasing the total number of animal unit months (AUMs) of specified livestock grazing (43 CFR 4110.3-1 and 4110.3-2). The setting aside of lands for future grazing use within the Monument, to offset potential future reductions in existing allotments or to facilitate research in grazing methods, is what the BLM refers to in this document as a grass bank. The BLM may designate grass banks on public lands within the Monument that are not apportioned to any grazing permittee or lessee. Grass banks shall meet the requirements of the Utah Standards and Guidelines in light of the Fundamentals of Rangeland Health, and they shall contain forage that may be apportioned on a sustained yield basis to qualified applicants for livestock grazing consistent with multiple-use management objectives. The BLM may consider making grass bank forage available on an emergency, nonrenewable basis under 43 CFR 4110.3-1(c). Should an allotment or a portion of an allotment become available through a voluntary relinquishment or an operation of law, it would be considered for grass banking.

The BLM is not obligated to graze the grass bank allotment annually, and use of the grass bank by qualified applicants, permittees, or lessees is within the discretion of the BLM.

***Science***

The geology, soils, and erosional characteristics in the Monument and the resulting plant communities provide opportunities to test, validate, and develop management methods, criteria, or techniques which would lead to improved grazing practices. Similarly, the Monument may present opportunities for testing new partnership arrangements with grazing permittees and interested publics that would lead to improved grazing practices. It would be the policy of the Monument to encourage the use of the special characteristics of the Monument to facilitate such testing or research using scientific methods where appropriate.

***Schedule***

The 3-step Grazing Management Process described above, and all associated NEPA documents, shall be completed within the 3 years commencing on the first July 1 following the approval of the Monument Management Plan.

***NIGHT SKIES***

Few places are as dark as south-central Utah. It is one of the darkest spots on NASA's satellite image of the United States at night. As such, the BLM would not propose actions within the Monument that would contribute to light pollution, and would be proactive in preventing light pollution within the Monument. The BLM would also work closely with the surrounding communities to minimize light pollution.

***RIPARIAN***

Riparian areas, though totaling less than 1 percent of the total lands in the Monument, are some of the most productive, ecologically valuable, and utilized resources in the Monument. The Riparian-Wetland Initiative for the 1990s established national goals and objectives for managing riparian-wetland resources on public lands. One goal is to provide the widest variety of vegetation and habitat diversity for wildlife, fish, and watershed protection.

Proper Functioning Condition (PFC) assessment protocols were developed to provide standardized assessments of riparian areas on public lands. The BLM uses this process to evaluate three components of a riparian-wetland area: (1) vegetation, (2) landform/soils, and (3) hydrology. Additional information may be collected during the PFC assessments of riparian areas.

The overall objective of the BLM with respect to riparian resources within the Monument would be to manage riparian areas so as to maintain or restore them to properly functioning conditions and to ensure that stream channel morphology and functions are appropriate to the local soil type, climate and landform.

Besides the general provisions that are provided elsewhere for use management, the following provisions apply to riparian areas. These provisions provide for the protection of these areas, as recognized in the Proclamation:

- C Although the standard protocols do not include evaluation of special status species habitat or ecological processes, these resources would also be evaluated in all future riparian assessments.
- C All segments of riparian habitat previously inventoried are scheduled to be reassessed as part of the grazing allotment assessments. Furthermore, riparian areas that have not been previously evaluated are scheduled for assessments in the next three years.
- C Monitoring of riparian resource conditions, if not currently occurring, would be established to determine when actions should be taken to ensure movement towards proper functioning condition on all riparian stream segments in the Monument.
- C Commercial filming, communication sites, and utility rights-of-way would avoid riparian areas whenever possible.
- C Vegetation restoration methods (described in the **Vegetation Management** section of this chapter) would not be allowed in these areas, unless needed for removal of noxious weed species or restoration of disturbed sites. In these circumstances, consultation with the GSENM Advisory

Committee would be used to determine the most appropriate control and restoration methods to ensure proper protection.

- C The noxious weed control program would target invasive species such as tamarisk and Russian olive, which would improve riparian functioning condition.
- C New recreation facilities would be prohibited, except for small signs for resource protection.
- C Trails would be kept out of riparian areas wherever possible. Where this is not possible, trails could be designed to minimize impacts by placing trails away from streams, using soil stabilization structures to prevent erosion, and planting native plants in areas where vegetation has been removed.
- C Group size limits may be imposed in these areas to restrict use beyond the restrictions provided in the various zones.

## SCIENCE AND RESEARCH

### Focus of Science and Research

The primary purpose for establishing GSENM is to protect the scientific and historic resources described in the Proclamation. Unparalleled opportunities for large-scale study of these resources are available throughout the Monument. In addition to the study of specific scientific resources, this setting allows study of such important issues as: understanding ecological and climatic change over time;

increasing our understanding of the interactions between humans and their environment; improving land management practices; and achieving a properly functioning, healthy, and biologically diverse landscape. Science would be supported and encouraged, but intrusive or destructive investigations would be carefully reviewed to avoid conflicts with the BLM's responsibility to protect and preserve scientific and historic Monument resources. By conducting research in the Monument, the BLM would be able to protect resources using the best possible information. For example, baseline inventories for hanging gardens can identify areas that are sensitive and areas that may be affected by proposed activities. This would allow the BLM to take appropriate measures for the protection of these resources. A comprehensive and integrated research and science program would ensure that scientific resources are not only available for current research opportunities, but that certain scientific resources are preserved in place for future study.

Monument management priorities and budgets would focus on a more comprehensive understanding of the resources of the Monument while assisting in the development of improved and innovative land management, restoration, and rehabilitation practices. The natural, physical, and social sciences, including the study of history would each play an essential role in science and research activities.

Research projects would have a multi-scale and interdisciplinary approach when possible. Recreation and other uses would be managed to complement science and research objectives.

The first priority for conducting BLM-sponsored research would be to study, collect, or record scientific information that is most at risk of being damaged or lost through disturbance or the passage of time, including oral histories and ethnologies related to the Monument area. The second priority would be to continue gathering baseline data on the biological, physical, cultural, and social sciences within the Monument. A third priority would be to conduct applied research regarding the management of natural systems, including disturbance and recovery strategies.

### **Education and Outreach**

The BLM would encourage researchers to incorporate a public outreach/education component into projects. Educators and students would have the opportunity to participate in research activities where appropriate. The BLM would also involve communities in science and education activities in order to provide the needed support to the emerging showcase of scientific exploration, cooperation, and management.

Research sites and visitor centers would emphasize scientific interpretation. Results of scientific research and inventory data would be disseminated through interpretive displays, publications, forums, and public exhibition of objects and artifacts. The BLM is currently

working on an interpretive plan for the Monument. Themes for the various visitor contact stations would be identified as well as appropriate onsite and offsite interpretation areas and topics. The BLM would also play a role in developing educational programs for grades Kindergarten through 12, emphasizing the area's scientific and cultural resources. The BLM would also cooperate with colleges and universities in undergraduate and graduate programs as resources permit. A Monument Internet website, Monument-sponsored science publications, and cooperative field schools would be incorporated into management programs to the extent possible. In addition to normal avenues for research publications (scientific journals, symposia proceedings, etc.), the BLM would help facilitate the transfer of research information to the public through periodic science forums and Monument-sponsored publications.

### **Management of Science and Research Activities**

In general, researchers would have to comply with the various zone prescriptions described throughout this chapter. However, some science and research activities may require the use of equipment, surface disturbance, and/or personnel which could exceed the management prescriptions outlined for visitors and other users. Except where specifically prohibited (e.g., in relict plant areas, wildlife protected activity centers), the BLM would consider exceptions to the zone prescriptions during the special-use permitting process for extremely high-value research opportunities, especially for those opportunities that may not be

available elsewhere (e.g., Late Cretaceous terrestrial vertebrate evolution). Research projects focused on protecting resources at risk would also be considered for exceptions to zone prescriptions. The GSENM Advisory Committee would be consulted on whether research proposals which require restricted activities warrant the requested exceptions. Evaluation would consider whether the proposed research could be permitted in a manner consistent with the protection of Monument resources, and whether the methods proposed are the minimum necessary to achieve the desired research objective. All research and related educational activities would require special-use permits. All research would meet Monument data collection standards to be established by the Monument Manager with the advice of the GSENM Advisory Committee, and would provide information that feeds directly into the adaptive management framework.

### **SPECIAL STATUS ANIMAL SPECIES**

The BLM would take measures to promote the recovery and conservation of all special status animal species within the Monument (including Federally listed endangered and threatened species, candidate species, and State sensitive species). This would be in accordance with applicable Endangered Species Act regulations (50CFR402) and BLM policy (6840 Manual, IM UT No. 97-66). Federally listed animal species are

discussed in detail below. There are currently no candidate animal species present within the Monument. A list of sensitive species is provided in Appendix 8. The BLM would continue ensure that actions authorized do not jeopardize the continued existence of any special status animal species or result in the destruction or adverse modification of critical habitats.

Activities would occur through consultation with the USFWS when listed or candidate species are involved, and also in conjunction with the U.S. Forest Service, the UDWR, and the National Park Service in areas where species cross jurisdictional lines. The BLM would work with these agencies to develop recovery plans, when needed, and to implement existing recovery plans for all listed species.

Surface disturbing research activities would generally not be allowed in threatened or endangered species habitat. All scientific research projects in close proximity to listed species populations or habitat would be evaluated by Monument biologists, the USFWS, and appropriate experts prior to initiation to determine impacts to these populations or habitat. Any research project that may have an effect on populations of listed species would be coordinated with the USFWS and appropriate permits and Section 7 consultation would be completed as determined necessary. Projects which provide new information and understanding of listed species, their populations, and/or their habitat, may be allowed after approval by the BLM and the review and issuance of permits by the

USFWS. All projects would be evaluated on a case-by-case basis.

Protection of habitat (nesting, roosting and foraging) is a primary consideration in meeting the objectives for protection of listed species. The following activities and programs would benefit the listed species, by limitation or action:

- C Fuelwood cutting, as described in the **Vegetation Management** section in this chapter, is restricted to designated areas, none of which would occur in known nesting or roosting habitat. These areas are small in size and are unlikely to affect foraging activities of raptors or other listed species. Future identification of fuelwood cutting areas would consider listed animal populations prior to designation.
- C Maintenance of existing seedlings would be allowed if consistent with the overall vegetation management objectives (see the **Vegetation Management** and **Overall Resource Objectives** sections of this chapter), but would not be allowed in areas where special status species roost or nest (unless consultation with USFWS indicates no effect to species). Research in seeded areas may be initiated to increase knowledge of disturbed ecosystems and provide information on restoration ecology. This knowledge would be helpful in the future if restoration is needed from unforeseen disturbance, such as fires.
- C There would be an active noxious weed control program in the Monument as

described in the **Noxious Weed Control** section of this chapter. This program would focus on areas where habitat is being lost due to changes in the water table and changes in vegetation structure and composition caused by noxious weeds. This weed control program would include the use of volunteer groups, BLM employees, county personnel, contractors, and adjacent agency personnel when appropriate. This program would target species in a prioritized manner. Priorities for weed control may include: invasiveness of the species, extent of invasion, sensitivity of area being invaded, and accessibility.

- C Nesting activities, roosting activities, and habitat of listed species can all be affected by use of OHVs in areas where they occur. All listed species would be substantially protected by restriction of OHV use to designated routes in the Monument. The BLM is pursuing cooperative agreements with each of the Sheriff departments in Kane and Garfield Counties to facilitate shared law enforcement and support for enforcing established closures. BLM law enforcement personnel and increased field presence of BLM field personnel would help deter non-compliance activities in closed areas.



- C Livestock grazing allotments would be evaluated and grazing as it relates to all endangered species would be addressed during this process and would incorporate the latest research and information in the protection of species. Section 7 consultation would be conducted for all allotments that may affect listed species during the individual allotment evaluations. This process would provide protection for listed and sensitive species as the evaluation would be site specific for each of the allotments.
- C The information on water describes a strategy for assuring water availability (see the **Water** section of this chapter). Priority would be to maintain natural flows and flood events. The measures described in that section would be initiated to accomplish this goal. In addition, the maintenance of instream flows would provide adequate water for natural structure and function of riparian vegetation.

The following additional measures would be applied to specific listed species in order to promote the protection and recovery of these species. Other measures may be implemented and some may be terminated, as deemed necessary through evaluation of monitoring data in conjunction with the adaptive management framework.

### Endangered Fish

The Colorado pikeminnow (*Ptychocheilus lucius*) and razorback sucker (*Xyrauchen texanu*) are found in the Colorado River system and were more prevalent prior to the construction of Glen Canyon Dam. There are no known records of these two fish within the boundaries of the Monument, and recent surveys have not located these species in the Escalante River. Regardless of this fact, activity level environmental assessments would be required before the use of any chemical substances that may reach Lake Powell through the Escalante River. Furthermore, the main use of these substances would be in the control of noxious weeds, which would increase water flows and water quality.

### Bald Eagle

The Northern States Bald Eagle Recovery Plan for the bald eagle was prepared in 1983, providing a strategy for the recovery of this species. Successful recovery of this species in much of its original range (most of North America) has initiated efforts to remove this species from the threatened species list. Regardless of the results of these efforts, the wintering habitat of this species in the Monument would be protected from actions that may contribute to its decline and actions that promote recovery and conservation would be encouraged.

- C If recreation activities (e.g., hiking, camping, backpacking) are determined to impact known roost sites, allocations and/or group size restrictions or other measures

would be implemented to reduce disturbance. If allocations and group size limits were implemented, they would be developed in accordance with the allocation and group size restrictions established for other areas of the Monument, described in the **Group Size and Recreation Allocation** sections in this chapter.

- C Trail construction would generally be limited to the Frontcountry and Passage Zones. Project level assessments and consultation with the USFWS would be completed before construction of any trails that are in close proximity to eagle roost sites. Designated primitive camping areas, picnic areas, and trailheads would not be located in areas of known roost sites for bald eagles. Every effort would be made to protect potential roosting areas in the Monument from human disturbance activities.
- C This Plan does not allow for the use of poisons for animal damage control activities. This eliminates the risk to eagles of feeding on poisoned animals. All control would be coordinated with Wildlife Services, as described in the **Wildlife Services** section of this chapter. Control of mountain lions and black bears are under the jurisdiction of the UDWR, and would

be coordinated to assure protection of bald eagles from poisoning.

### Peregrine Falcon

An American Peregrine Falcon Recovery Plan (Rocky Mountain Southwest Populations) was prepared in 1984 which outlined the recovery of this species in this part of the country. Due in large part to recovery efforts, they now breed from non-Arctic Alaska to southern Baja California, central Arizona and Mexico (locally), and their eastern limit presently follows the eastern front of the Rocky Mountains. The return of this species to much of its historic range has prompted efforts to remove the peregrine from the endangered species list [Federal Register (Vol. 63, No. 165) August 26, 1998, pp. 45446-45463]. Regardless of the results of these efforts, peregrine falcon habitat in the Monument would be protected from actions that may contribute to the decline of this species. Actions which promote recovery and conservation would be encouraged.

- C If recreation activities (e.g., hiking, camping, backpacking) are determined to impact known nest sites, allocations and/or group size restrictions or other measures would be implemented to reduce disturbance. If allocations and group size limits were implemented, they would be developed in accordance with the allocation and group size restrictions established for other areas of the Monument, described in the **Group Size**

and **Recreation Allocation** section of this chapter.

- C Trail construction would generally be limited to the Frontcountry and Passage Zones. Project level assessments and consultation with the USFWS would be completed before construction of any trails proposed within 1 mile of falcon nest sites. New designated primitive camping areas, picnic areas, and trailheads would not be located within 1 mile of known falcon nests, unless consultation with USFWS determines that impacts to nesting birds would not occur. This 1 mile buffer is recommended in the "Utah Field Guide for Raptor Protection from Human and Land Use Disturbances" (USFWS, 1999).
- C Criteria for designation of climbing areas would be established for the Monument. These criteria would not allow climbing areas to be designated in known peregrine falcon nest sites. If new sites are identified as occupied for nesting in areas designated for climbing, seasonal closures would be established in those areas to assure that disturbance of nesting activities does not occur.

### Mexican Spotted Owl

A recovery plan for the Mexican spotted owl was prepared by the Southwest Region of the USFWS in 1995. No critical habitat has been designated for the spotted owl. Regardless of this fact, the protection of spotted owls and

their habitat within the Monument would be protected from impacts which might contribute to their decline and actions which promote recovery and conservation would be encouraged.

- C Fires have played only a small role in the recent history of vegetation in the Monument. Thus, the potential for large fires, which would remove foraging habitat for the owl, are minimal. Fire suppression activities may have a greater impact than allowing fire to burn in an area. With this in mind, suppression activities would be evaluated by fire resource advisors prior to implementation to provide appropriate protection measures in spotted owl habitat.
- C If recreation activities (e.g., hiking, camping, backpacking) are determined to impact known nest sites, allocations and/or group size restrictions or other measures would be implemented to reduce disturbance. If allocations and group size limits were implemented, they would be developed in accordance with the allocation and group size restrictions established for other areas of the Monument, as described in the **Group Size** and **Recreation Allocation** sections of this chapter.

- C Trail construction would generally be limited to the Frontcountry and Passage Zones. Project level assessments and consultation with the USFWS would be completed before construction of any trails

that are in close proximity to owl nest sites. Designated primitive camping areas, picnic areas, and trailheads would not be located within ½ mile of known spotted owl nesting, unless consultation with USFWS determines that impacts to nesting birds would not occur. This ½ mile buffer is recommended in the “Utah Field Guide for Raptor Protection from Human and Land Use Disturbances” (USFWS, 1999).

- C Criteria for designation of climbing areas would be established for the Monument. These criteria would not allow climbing areas to be designated in known Mexican spotted owl nest sites. If new nest sites are identified in areas designated for climbing, seasonal closures would be established in those areas to assure that disturbance of nesting activities does not occur.
- C A comprehensive inventory for spotted owls in the Monument was begun in 1999. This is a multi-year project that will look at occurrence of owls, current habitat, and potential habitat (i.e., habitat that is potential if modifications were made to that habitat). After the surveys are completed, the BLM would designate protected activity centers in accordance with the recovery plan. Activities such as recreational use in these protected areas may be limited to help protect this species. Limitations may include prohibition of camping or hiking during critical times of the year and/or limitations on the number of people or group size allowed. Limitations would be based on the

identification of activities that may be affecting this species.

### **Southwestern Willow Flycatcher**

For the purposes of the Endangered Species Act, all breeding southwestern willow flycatchers in GSENM are endangered southwestern willow flycatchers. Non-breeding southwestern willow flycatchers confirmed outside the June 22 to July 10 window may or may not be endangered willow flycatchers. No recovery plan has been prepared for this species, but efforts are underway to complete a recovery plan. Critical habitat was not designated for this species when it was listed, but action which promote the recovery and conservation of this species and habitat would be encouraged.

- C A comprehensive inventory for southwestern willow flycatcher populations in the Monument was begun in 1999. This is a multi-year project that will look at occurrence of southwestern willow flycatchers, current habitat, and habitat that is potential if modifications are made (i.e., removal of tamarisk). This inventory will help to identify some of the impacts that are occurring in the area, which will help the BLM determine when and where limits on activities (such as recreational use) need to be implemented to protect the southwestern willow flycatcher.

### **California Condor**

On October 16, 1996 the USFWS reintroduced the California condor into northern Arizona/southern Utah and designated this population as nonessential and experimental under section 10(j) of the Endangered Species Act [Federal Register (Vol. 61, No. 202) October 16, 1996, pp. 54044-54060]. The purpose of this population is to establish a second non-captive population, spatially disjunct from the southern California population as part of the recovery for this species. An agreement between the counties in Utah and the USFWS outlines a positive working relationship, and stipulates that reintroduction would not impact current or future land use planning. Although Section 7 consultation is not required for this species, the USFWS and the BLM agree that it is appropriate and desirable to discuss this species. Efforts would be made to protect potential habitat for this species and to limit activities which may be detrimental to their existence in cooperation with the counties and the USFWS.

### **Kanab Ambersnail**

A recovery plan for the Kanab ambersnail was prepared in 1995. In Utah, the ambersnail is known to exist in two small populations in Kanab Creek and a new location near the “Best Friends Sanctuary” just outside Kanab (Meretsky, personal communication, 1998). Although Kanab Creek is a drainage not connected to the Monument, there is the

potential for this species to occur within the Monument. Surveys for this species have begun in 1999. Surveys are being conducted in potential habitat, moist seeps, and along water courses in the Grand Staircase portion of the Monument. Results of this survey will be used to determine the potential for further surveys. If this species is discovered in the Monument, actions would be taken to improve habitat as consistent with the recovery plan objectives. Actions may include assuring flows in appropriate streams and seeps by removing non-native plants affecting the water table and reducing impacts from visitors and/or livestock. Surveys will also identify current habitat and habitat that is potential if modifications are made.

### **SPECIAL STATUS PLANT SPECIES**

In addition to the vegetation management objectives stated previously, the BLM would take measures to promote the recovery and conservation of all special status plant species within the Monument (including Federally listed endangered and threatened species, candidate species, and State sensitive species). This would be in accordance with applicable Endangered Species Act regulations (50 CFR 402) and BLM policy (6840 Manual, IM UT No. 96-69). Federally listed plant species are discussed in detail below. There are currently no candidate plant species present within the Monument. A list of sensitive species is provided in Appendix 9. The BLM would continue to ensure that actions authorized do not jeopardize the continued existence of any

special status plant species or result in the destruction or adverse modification of critical habitats.

Activities would occur through consultation with the USFWS when listed or candidate species are involved, and also in conjunction with the U.S. Forest Service, the Utah Division of Wildlife Resources' Natural Heritage Program, and the National Park Service in areas where plant species cross jurisdictional lines. The BLM would work with these agencies to develop recovery plans, when needed, and to implement existing recovery plans for all listed species.

Although there are emergency exceptions for specific activities in the Monument, vehicular travel into areas of known habitat or locations of sensitive species would not be included in these provisions. These locations would be protected from impacts that might lead to the decline of the species unless, through consultation with the USFWS, the action is deemed necessary for proper management of the species.

Surface disturbing research activities would generally not be allowed in threatened or endangered plant species habitat. All scientific research projects in close proximity to listed species populations or habitat would be evaluated by Monument biologists, the USFWS, and appropriate experts prior to initiation to determine impacts to these populations or habitat. Any research project which may have an effect on populations of listed species would be coordinated with the

USFWS and appropriate permits and Section 7 consultation would be completed as determined necessary. Projects which provide new information and understanding of listed species, their populations and/or their habitat, may be allowed after approval by the BLM and the review and issuance of permits by the USFWS. All projects would be evaluated on a case-by-case basis.

Livestock grazing has the potential to be detrimental to listed plant species through trampling, soil compaction, and disturbance of riparian vegetation during certain seasons. Grazing can be beneficial to Ute ladies'-tresses, however, by controlling or limiting the density of the vegetation, allowing the orchid to get enough light to grow. In fact, the Ute ladies'-tresses population is currently healthy, leading to the conclusion that current levels of grazing are either benign or beneficial to the population. For Kodachrome bladderpod and Jones' cycladenia there is little potential for cattle to impact these populations in the Monument, due to the sparse vegetation and inaccessibility where they grow. Grazing allotments would be evaluated consistent with the BLM-wide grazing permit review process. This process would address protection of endangered species and would incorporate the latest research and information in the protection of species. Section 7 consultation would be conducted for all allotments during the individual allotment evaluations. This process

would provide necessary protection for listed and sensitive species.

Fuelwood cutting, as described in the **Forestry Products** section of this chapter, is restricted to designated areas, none of which would occur in listed species populations. Future fuelwood cutting areas would not be designated in listed plant populations.

There would be an active noxious weed control program in the Monument as described in the **Noxious Weed Control** section of this chapter. Areas with threatened or endangered plants would be targeted for these activities as a first priority. BLM employees or contractors with appropriate certification would be responsible for use of chemicals in noxious weed removal efforts, and would take precautions to prevent possible effects to non-target species.

Public education about protection of these species would be an integral part of all projects and would be provided in interpretive displays and handouts at project sites and visitor centers around the Monument. Information would also be included on the Monument website.

Commercial filming, communication sites, utility rights-of-way, and road rights-of-way would not be permitted in known special status species populations for any reason. As permits are granted for these sites and rights-of-way, surveys would be completed to determine the presence of special status species in the area. If they are found, these activities would be moved to another location.

Reseeding or surface disturbing restoration after fires in these areas would not be allowed. Natural diversity and vegetation structure would provide adequate regeneration of areas. Management ignited fires would also not be allowed in these areas.

The following additional measures would be applied to specific listed species in order to promote the protection and recovery of these species. Other measures may be implemented and some may be terminated, as deemed necessary through evaluation of monitoring data in conjunction with the adaptive management framework.

#### **Jones' Cycladenia**

- C Historically, there have been threats from mining and mineral operations in the Jones' cycladenia populations. No new mining claims or mineral/oil and gas leases are allowed on the Monument. Furthermore, there are currently no mining or mineral operations in the area that would affect this population of plants or its habitat. There are oil and gas leases in the area, some of which have been suspended. These leases expire by the year 2003 if no action is taken to develop them. If a lease holder submits an application for permit to drill on these leases, stipulations would be placed in the permit to prevent impacts to these populations through avoidance or other conservation measures (through consultation with the USFWS). Due to the current state of hydrocarbon resources in the country, there is limited potential for

the development of these leases prior to their expiration.

- C Jones' cycladenia habitat would be substantially protected by restrictions on OHV use in the Monument. Since OHV use would occur on designated routes in the Monument, and none of these routes are near the population or habitat, there would be no impact from these activities to the Jones' cycladenia population (refer to the **Enforcement** section in this chapter).
- C Inventories to locate new populations of this species would be conducted to provide more accurate information on distribution and to facilitate protection and recovery.

#### **Kodachrome Bladderpod**

- C Historically, there have been threats from mining and mineral operations in the Kodachrome bladderpod populations. No new mining or mineral claims would be allowed on the Monument. Furthermore, there is no mining or mineral development in the Kodachrome bladderpod population currently, and no existing mining claims or mineral leases in the population area.
- C Monitoring plots were established in 1997 to determine population health and to measure impacts to the Kodachrome bladderpod population. Areas documented as having impacts in 1998 were temporarily closed and would

remain closed to travel off of designated routes in conjunction with plan provisions in the **Transportation and Access** section of this chapter. The one route remaining open in that area would be closed to OHV use.

- C Physical barriers as well as “closed” signs may be placed in strategic locations to prevent access into areas where the Kodachrome bladderpod grows. Restoration in closed areas may occur to eliminate impacts and return the area to pre-disturbance condition. Monitoring would continue in order to determine effects of closures and to measure the resilience of the population.
- C Compliance with established closures would be facilitated by the BLM pursuing cooperative agreements with each of the Sheriff departments in Kane and Garfield Counties, who would aid in enforcing established closures. The BLM law enforcement personnel would help with the increased enforcement of closures. The increased field presence of BLM field personnel would help deter non-compliance activities in closed areas.
- C Additional monitoring sites would be developed in strategic locations to measure impacts to the population, following established protocols. If, through monitoring, impacts to the population from visitors were identified, visitor allocations or other measures would be imposed to prevent impacts from increased visitation and use. Group size and numbers of

groups allowed in the area, as well as the types of activities allowed, could be limited to accomplish these goals.

- C Trails, parking areas or other recreations facilities would not be allowed in these areas.
- C Camping, overnight stays and campfires would not be allowed in these areas.

#### **Ute Ladies’-tresses**

- C The information in the **Water** section of this chapter describes a strategy for assuring water availability. Under that strategy, priority would be to maintain natural flows and flood events. In addition, the maintenance of instream flows would provide adequate water for natural structure and function of riparian vegetation.
- C Surveys for this species would be completed during the 1999 growing season and results of this survey would be used to determine any further actions.
- C Appropriate actions would be taken to prevent trampling of the plants by visitors in high-use areas. These actions may include replanting native vegetation or construction of barriers.
- C Areas may be closed if necessary to protect these plants. Barriers would be constructed and restoration work initiated to stabilize the soil and banks and provide the best possible habitat for this plant.

- C No expansion of current or new facilities would be permitted where this plant grows.

- C Existing trails in areas where this plant grows would be relocated out of the area when possible. These protection measures apply to current as well as future potential habitat areas for this species.

- C Interpretive materials would be developed to educate the public about Ute ladies’-tresses and the actions being implemented to protect it.
- C Restoration of the current social trails in known populations would be initiated, including obliteration of the trail by planting native species, and moving soil to return the area to its natural grade. Group size restrictions, allocations or other measures would be initiated if continued monitoring indicates that visitor use in the area is causing impacts.

#### **VALID EXISTING RIGHTS AND OTHER EXISTING AUTHORIZATIONS**

The Proclamation establishing the Monument states: “The establishment of this monument is subject to valid existing rights.” This sentence reflects the President’s intention to honor rights that existed prior to the establishment of the Monument. Before it was established, the lands within GSENM were subject to various

authorizations, some giving “rights” to the holders and some of which could be construed as providing valid, but lesser, interests.

Valid existing rights (VERs) are those rights in existence within the boundaries of GSENM when the Monument was established on September 18, 1996. Valid existing rights were established by various laws, leases, and filings under Federal law, and for leases on lands acquired by the United States from Utah, under Utah State law. This section describes such VERs within the Monument, addresses how VERs would be verified, and explains how applications and notices filed after completion of this Plan on existing mining claims would be addressed. Also addressed are the lesser interests or other authorizations that existed prior to September 18, 1996; a discussion of how those authorizations would be handled subsequent to approval of the Plan is also included.

### **Energy and Mineral Activities (Including Hardrock, Oil, Gas, and Coal)**

The Proclamation establishing the Monument withdrew all Federal lands and interests in lands within the Monument from entry, location, selection, sale, leasing, or other disposition (except for exchanges that further the protective purposes of the Monument) under the public land laws, including the mineral leasing and mining laws. Thus, no new Federal mineral leases or prospecting permits may be issued, nor may new mining claims be located within the Monument. Authorization for activities on existing mineral

leases and mining claims, according to the Proclamation, would be governed by VERs.

With respect to oil and gas leases, mineral leases, and mining claims “valid existing rights” vary from case to case, but generally involve rights to explore, develop, and produce within the constraints of laws and regulations. The Federal laws, regulations, and standards related to Mineral Activities are described in Chapter 2 of the DEIS.

Within the Monument, there are currently 68 Federal mining claims covering approximately 2,700 acres, 85 Federal oil and gas leases encompassing more than 136,000 acres, and 18 Federal coal leases on about 52,800 acres (Table 2.1). Newly acquired Utah School and Institutional Trust Lands Administration (SITLA) mineral and oil and gas leases are summarized below in the section titled **School and Institutional Trust Lands Administration Lands Acquired**.

The BLM would verify whether VERs are present in each of these cases by periodically reviewing the files related to existing mining claims and leases. This would help ensure that required actions, filings, and fees are in full compliance with the law. This process, known as adjudication, would continue for the life of each VER. With regard to mining claims and millsites located under the Mining Law of 1872, the BLM would initiate a validity examination process to verify the VERs of claimants before such claimants conduct surface disturbing activities greater than casual use. Valid mining claims require existence on September 18, 1996, of a discovery of a

valuable mineral deposit, as well as a continuing discovery to the date of the validity examination and thereafter. For previously approved operations, the BLM would conduct validity examinations. For new proposals, except as described in the next sentence, the BLM would (1) withhold approval of plans of operations under 43 CFR 3802 or 3809 until the validity examination process is complete and the claims are determined to be valid; and (2) inform persons who have written the BLM that they intend to commence notice-level operations under 43 CFR 3809 that such operations cannot commence until the BLM completes its validity examination process and has verified that there are VERs. Until the validity examination process is complete, the BLM may allow notice-level operations or approve a plan of operations under 43 CFR 3809 for operations on unreclaimed previously disturbed areas, which are limited to taking samples to confirm or corroborate mineral exposures that are physically disclosed and existing on the mining claim. BLM may deny plans of operations without the performance of a validity examination if such denial is consistent with BLM regulations and policy.

In addition, VERs may be examined in the field for compliance with laws and regulations. The BLM would continue to monitor oil and gas activities through its Inspection Program.

Once a VER is verified, the process used to address applications or notices filed under that VER (such as an application to drill on an oil or gas lease, or a plan of operations or notice filed on a mining claim) would vary by commodity and regulation. However, for all applications and notices, the BLM would use a documented analysis (NEPA or other written documentation) to determine potential impacts on the Monument resources that the Approved Plan is required to protect. Once such analysis is completed, the BLM would take the following actions on a case-by-case basis:

1. If the analysis indicates no impact to Monument resources, or indicates impacts to resources, but determines that the impacts are consistent with the Proclamation and this Plan, the proposed operation can proceed in accordance with applicable regulations, standards and stipulations.
2. If analysis and documentation indicate that, under the laws, regulations, and stipulations discussed above, a proposal may have impacts that are not in conformance with the Proclamation and this Plan, the BLM would take the following actions on a case-by-case basis:
  - A. Work with the applicant to find alternatives or modifications to the proposal that would either:
    1. Cause no adverse impacts to Monument resources, or
    2. Minimize such impacts through special stipulations or other permit conditions, consistent with the applicant's rights.

- B. If unable to prevent or minimize adverse impacts as described in A, disapprove the proposed action if disapproval is consistent with the applicants' rights. For persons with rights within WSAs within the Monument, the BLM would also be guided by its July 5, 1995, Interim Management Policy and Guidelines for Lands Under Wilderness Review.

**Table 2.1**  
**Summary of GSENM Mineral Leases**

<i>Summary of GSENM Mineral Leases</i>		
<i>Lessee</i>	<i>No. Leases</i>	<i>Acres</i>
<b><i>Federal Coal Leases</i></b>		
Andalex	17	34,499
PacifiCorp	1	18,287
<b><i>Subtotal</i></b>	<b>18</b>	<b>52,786</b>
<b><i>Federal Oil &amp; Gas Leases</i></b>		
Individual Operators	14	9,984
Citation O&G, et al.	6	9,153
Kidd Family Partnership	7	10,672
Conoco - Rangeland	58	106,518
<b><i>Subtotal</i></b>	<b>85</b>	<b>136,327</b>
<b><i>Total</i></b>		<b><i>189,113</i></b>

#### Other Existing Rights or Interests

There are other situations, unrelated to minerals, in which the BLM has authorized some use of public land, or has conveyed some limited interest in public land. The authorization may be valid, existing when the Monument was designated, and may convey some "right" or interest. Many rights-of-way<sup>2</sup>, easements<sup>3</sup>, and leases<sup>4</sup> granted on public land are in this category. They vary from case-to-case, but the details of each one are specified in the authorizing document. Chapter 2 in the DEIS lists the authorizations for these activities.

These authorizations, where they are valid and existed when the Monument was established, would be recognized in the Monument and their uses would be allowed subject to the terms and conditions of the authorizing document. Where these uses conflict with the protection of Monument resources, and where legally possible, leases, permits, or easements would be adjusted to eliminate or minimize adverse impacts.

There are currently 106 rights-of-way authorized under FLPMA and the Mineral Leasing Act (see Chapter 3 of the DEIS for more detail on existing rights-of-way and other authorizations). In addition to these authorizations, there are 17 authorized mineral material sites in the Monument where the removal of construction-type minerals such as sand and gravel had been allowed. Seven of the mineral material sites were authorized



under the Materials Act of 1947 (30 USC 601 *et seq.*), as amended, and were subject to either free use permits or contracts of sale. The Materials Act of 1947 specifically excludes the disposal of mineral materials from National Monuments. As a result, free use permits or contracts for mineral materials authorized under this Act would not be renewed.

The remaining ten sites are authorized under Title 23 USC Section 107 (1998), which provide for the appropriation of lands or interests in lands for highway purposes (see Chapter 3 of the DEIS for more detail on existing mineral material sites and Title 23 sites). Unlike free use permits or contracts for sale of mineral materials that are issued for a fixed term, Title 23 rights-of-way continue indefinitely. The BLM does not resume jurisdiction over the land covered by the rights-of-way until the lands are returned to the BLM upon a determination by the Federal Highway Administration that the need for the material no longer exists. Existing Title 23 rights-of-way within the Monument are inconsistent with the protection of Monument resources. The BLM would request closure of those sites from the Federal Highway Administration and would work with the Federal Highway Administration to find suitable replacement sources of mineral material.

### ***Non-Federal Land Inholdings***

There are approximately 15,000 acres of private land within the boundary of the Monument. They are not Monument lands,

but their presence has implications for Monument lands, because landowners generally have rights to reasonable access to their lands across public lands. The Proclamation does not alter that.

Owners of non-Federal land surrounded by public land managed under FLPMA are entitled to reasonable access to their land. Reasonable access is defined as access that the Secretary of the Interior deems adequate to secure the owner reasonable use and enjoyment of the non-Federal land. Such access is subject to rules and regulations governing the administration of public land.<sup>5</sup> In determining reasonable access, the BLM has discretion to evaluate and would consider such things as proposed construction methods and location, reasonable alternatives, and reasonable terms and conditions as are necessary to protect the public interest and Monument resources.

The BLM would consider land exchanges and acquisitions so long as the current owner is a willing participant and so long as the action is in the public interest, and is in accordance with other management goals and objectives of this Plan. The action must also result in a net gain of objects and values within the Monument, such as wildlife habitat, cultural sites, riparian areas, live water, threatened or endangered species habitat, or areas key to the maintenance of productive ecosystems. The action may also meet one or more of the following criteria:

- C ensures the accessibility of public lands in areas where access is needed and cannot otherwise be obtained;

- C is essential to allow effective management of public lands;
- C results in the acquisition of lands which serve a National priority as identified in National policy directives.

All land exchanges and acquisitions would be subject to VERs as determined by the BLM.

### ***Other Land Use Authorizations***

There are a variety of other land use authorizations which were in effect at the time of the Proclamation, and which, although they involve no “rights,” are being continued in the Monument. Outfitter and guide permits are an example. These permits authorize certain uses of public land for a specified time, under certain conditions, without conveying a right, title, or interest in the land or resources used. Such permits would be recognized in the Monument and fulfilled subject to the terms and conditions of the authorizing document. If at any time it is determined that an outfitter and guide permit, other such permit, or any activities under those permits, are not consistent with the Approved Monument Management Plan, then the authorization would be adjusted, mitigated, or revoked where legally possible.

Grazing permits are also in this category. Grazing permits or leases convey no right, title, or interest in the land or resources used. Although the Proclamation specifically

mentions livestock grazing, it does not establish it as a “right” or convey it any new status. The Proclamation states that “grazing shall continue to be governed by applicable laws and regulations other than this proclamation,” and says that the Proclamation is not to affect existing permits for, or levels of, livestock grazing within the Monument. Other applicable laws and regulations govern changes to existing grazing permits and levels of livestock grazing in the Monument, just as in other BLM livestock grazing administration programs. Management of livestock grazing is addressed previously in the **Livestock Grazing** section of this chapter.

#### **School and Institutional Trust Lands Administration Lands Acquired**

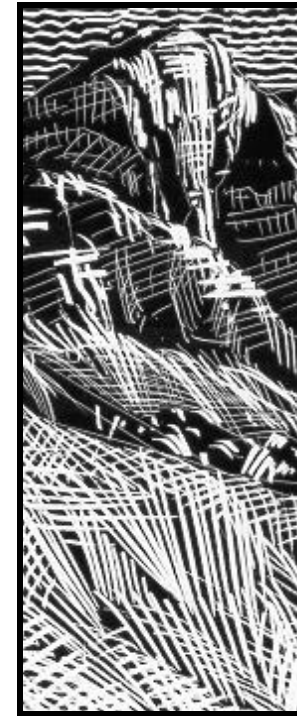
On October 31, 1998, President Bill Clinton signed into law the Utah Schools and Lands Exchange Act of 1998 (Public Law 105-335), ratifying a May 8, 1998 Agreement to Exchange Utah School Trust Lands Between the State of Utah and the United States of America (Agreement). Under this Act, the State inholdings within the Monument were transferred to the United States, along with the mineral interest on approximately an additional 24,000 acres. The lands contain numerous interests of varying types (e.g., leases, permits, licenses) held by third parties. The conveyance occurred on January 8, 1999. Section 5(A) of the Agreement provides that any lands and interests in lands acquired by the United States within the exterior boundaries of Grand Staircase-Escalante National Monument under the Agreement shall become part of the Monument and shall

be subject to all laws and regulations applicable to the Monument.

The conveyance by the State of Utah to the United States was subject to all VERs, existing authorizations, and other interests outstanding in third parties found acceptable under the Attorney General’s title regulations, including:

- C valid existing water rights owned by private parties;
- C all leases, permits and contracts for grazing of domestic livestock, and the related terms and conditions of the State’s user agreements;
- C title to, or any interest in, any range improvement held by any private party on such lands;
- C all rights-of-way and special use agreements; and
- C existing surface and mineral leases.

Table 2.2 summarizes the leases, permits, and other authorizations associated with SITLA lands that were acquired by the BLM within the Monument.



**Table 2.2**  
**Summary of Authorizations Acquired from SITLA**

Number	Type	Miles/Acres
1	Water storage/settling pond permit	5.99acres
2	Water pipeline permits	4.64acres
1	Water pipeline permit	No data available
1	Water pipeline easement	1.00acres
5	Power line permits	7.59miles
2	Power line permits	No data available
1	Power line easement	0.55 miles
1	Oil pipeline permit	1.29 acres
1	Oil storage facility permit	5.01 acres
6	Fence permits	6.78 miles
1	Stock watering well permit	18.99 acres
1	Trail permit	No data available
1	Stock driveway permit	0.75 miles
1	Livestock watering site permit	839 ft. of pipe & 28 ft. of troughs
1	Pipeline, valves & boxes permit	No data available
1	Building side camp permit	No data available
2	Unpaved route permits	2.93 acres
1	Unpaved route permit	No data available
2	Paved road (highway) permits	67.79 acres
80	Livestock grazing permits	134,174.53 acres
7	Coal leases	4,479.96 acres
3	Gypsum leases	200.00 acres
3	Gem/Fossil leases	240.00 acres
14	Metallic minerals leases	7,560.83 acres
93	Oil and gas leases	76,643.24 acres
1	Building stone leases	40.00 acres

The Agreement provides express assurances that the United States would accept the transferred lands subject to VERs found acceptable under the Attorney General's title regulations. Specifically, section 6 makes clear that nothing contained in the Agreement would impair valid existing water rights owned by private parties. All terms and conditions of existing State grazing permits would be honored. Moreover, ranchers who rely on the State section to meet Federal base property requirements for Federal grazing permits would be able to continue to use the former State section to qualify as base property. The agreement also includes a provision ensuring that nothing expands or diminishes pre-existing rights-of-way under State or Federal law. Finally, mineral leases would remain in force and subject to their existing terms.

The BLM would be acting in place of the State in administering all valid existing authorizations for the remainder of the applicable term in accordance with State laws and regulations. As part of such administration, BLM decisions would be subject to those Federal laws which are ordinarily attached to Federal decisions (e.g., the National Environmental Policy Act, Endangered Species Act, National Historic Preservation Act). Renewal of any lease, permit, or contract would occur if provided for under the terms of the lease, permit, or contract. Upon expiration of any grazing lease or permit, the holder shall be entitled to a preference right to renew such lease or

permit to the extent provided by Federal law. This provides a priority to the holder of the expiring lease or permit against other applicants, but does not guarantee that a renewal will occur. [Public Lands Council v. Babbitt, 158 F.3rd 1160, 1171 (10<sup>th</sup> Cir 1998)]

## VEGETATION MANAGEMENT

### Relict Plant Communities and Hanging Gardens

Relict plant communities are areas that have persisted despite the pronounced warming and drying of the interior west over the last few thousand years (Betencourt, 1984) and/or have not been influenced by settlement and post-settlement activities (such as domestic livestock grazing). This isolation, over time and from disturbance, has created unique areas that can be used as a baseline for gauging impacts occurring elsewhere in the Monument and on the Colorado Plateau.

Hanging gardens occur where ground water surfaces along canyon walls from perched water tables or from bedrock fractures. The existence of hanging gardens is dependent on a supply of water from these underground water sources. The geologic and geographic conditions for hanging gardens exist throughout southern Utah (Welsh and Toft, 1981), including the Monument. The potential for finding additional locations of hanging gardens in the Grand Staircase and Escalante sections of the Monument is also

high. Due to the conditions of isolation produced in hanging gardens, there is a potential for unique species in these areas.

In addition to the general provisions provided elsewhere for use management, the following provisions apply to hanging gardens and relict areas. These provisions provide for the protection of these areas, as recognized in the Proclamation:

- C Vegetation restoration methods (described in the next section) would not be allowed in these areas, unless needed for removal of noxious weed species. In these circumstances, consultation with the GSENM Advisory Committee would be used to determine the most appropriate control methods to ensure proper protection.
- C No new water developments would be authorized in these areas. Maintenance activities would be allowed if these resources were not affected.
- C Surface disturbing research would not be allowed in these areas.
- C Parking areas or other recreation facilities would not be allowed in these areas.
- C Camping, overnight stays, and campfires in these areas would not be allowed.
- C Group size limits may be imposed in relict plant areas to restrict use beyond the restrictions provided in the various

zones. Most of these areas occur in the Primitive Zone which has limits of 12 people and 12 pack animals. Pack stock would not be allowed in these areas, effectively limiting the group size to 12 people.

- C Communication sites and utility rights-of-way would not be allowed in these areas.
- C Inventories, modeling, and field investigations for both relict plant communities and hanging gardens would be conducted to ensure their protection. Current information on the location of these associations in the Monument are largely anecdotal and may change following consideration of inventory data.

### Vegetation Restoration Methods

A variety of vegetation restoration methods may be used to restore and promote a natural range of native plant associations in the Monument. Use of machinery, as defined below, would not be allowed in the Primitive Zone. Methods and projects which do not achieve this objective or which irreversibly impact Monument resources would not be permitted. Vegetation restoration methods fall into four broad categories: mechanical, chemical, biological, and management ignited fires. Each of these methods would be used in accordance with the overall vegetation objectives discussed in the **Vegetation** section of this chapter, and progress towards these objectives would be monitored as part

### of the **Implementation and Adaptive Management Framework** (Appendix 3).

Mechanical methods include the use of hand tools (e.g., chainsaws, machetes, pruners), the use of machinery (e.g., roller chopping, chaining, plowing, discing), and manual pulling. Chaining has been used in the past to remove pinyon and juniper prior to reseeded with perennial grasses. Due to the potential for irreversible impacts to other Monument resources, such as archaeological sites and artifacts, and paleontological resources, this treatment method would not be used to remove pinyon and juniper. It would be allowed to cover rehabilitation seed mixes with soil after wildfires where: (1) noxious weeds and invasive non-native species are presenting a significant threat to Monument resources or watershed damage could occur if the burned area is not reseeded, (2) it can be demonstrated that Monument resources would not be detrimentally affected (i.e., completion of full archaeological, paleontological, threatened and endangered species and other resource clearance and consultation), (3) it is determined that seed cover is necessary for the growth of the native species proposed for seeding, and (4) other less surface disturbing measures of covering seed are not available or cannot be applied in a timely manner. Visual impacts of chaining would also be minimized near routes and other points of concern by covering the native seed mix with harrows or light chains. The GSENM Advisory Committee would be consulted

before the mechanical treatments are permitted.

Livestock grazing after the native seedlings are established would be modified to ensure the survival of the native plants. The livestock exclusion period required to allow full establishment of seeded native species and recovery of surviving native plants after a wildfire may be more than two years. Site evaluation would be required to determine when the native seedlings should be grazed again and the effectiveness of the current or new grazing system on the persistence of native plants.

Chemical methods, including aerial spraying, would generally be restricted to the control of noxious weed species, and are discussed in that section. The use of chemicals may be allowed in conjunction with research projects and must lead to the achievement of the overall vegetation objectives. These activities would be approved as determined appropriate through consultation with the GSENM Advisory Committee.

Biological control would be used exclusively for control of noxious or exotic weed species and a discussion is included in that section.

The last method is the use of management ignited fire. This is the method most likely to be used in the Monument and would be used when fire has been documented to historically occur in an area, and where various factors have prevented natural fire cycles from occurring. In these

circumstances, management ignited fires may be used, and would attempt to simulate natural fire intensity and timing. Specific objectives for all management ignited fires would be developed prior to its use in the Monument. The use of non-native plants in conjunction with fire rehabilitation is discussed in the non-native plant section. All fire activities would be conducted and coordinated with appropriate fire management personnel, as provided for in the Color Country Interagency Fire Management Area annual operating plan.

With all of the methods described above, vegetation monitoring plots would be established to determine the effectiveness of the treatments in achieving management objectives and to provide baseline data of overall change. This monitoring would include species frequency, density and distribution data, and would be part of the overall adaptive management framework described in Appendix 3.

### **Noxious Weed Control**

In accordance with National and State policies, the BLM is mandated to control noxious weed species. Control of noxious weeds is also a priority to achieve the overall vegetation objectives stated above. In the control of these invasive species it is imperative to have an array of methods from which to choose. Use of chemicals (aerial spraying, hand spraying, and painting), hand cutting, biological control agents, and manual

pulling are all viable methods for control of noxious weed species. Each of these methods has a place in the control of these invasive species and would be evaluated for its effectiveness as eradication projects are designed. BLM employees or contractors with appropriate certification would be responsible for use of these chemicals and would take precautions to prevent possible effects to non-target plant species. Aerial chemical applications could only be used in limited circumstances where: (1) accessibility is so restricted that no other alternative means is available, (2) it can be demonstrated that non-target sensitive species or other Monument resources would not be detrimentally affected, and (3) noxious weeds are presenting a significant threat to Monument resources. The GSENM Advisory Committee would be consulted before the aerial application of chemicals is permitted.

Working in conjunction with Kane and Garfield Counties and adjacent U.S. Forest Service and National Park Service staffs, the BLM hopes to control noxious weed species and prevent introduction of new invasive species into the Monument and surrounding ecosystems. An active control program would target species in a prioritized manner. Priorities for weed control may include: invasiveness of the species, extent of invasion, sensitivity of area being invaded, and accessibility. Project level environmental assessments or other NEPA analysis would be completed prior to noxious weed removal project initiation.

In addition to strategies for control of noxious weeds, it is also imperative to reduce the introduction of noxious weed species as stated in Presidential Executive Order (EO 11312) on invasive species. Cooperative programs established for control of these species can also help identify potential new invasions before area-wide establishment has occurred. There are two policies which would help to reduce potential noxious weed introduction. First, the BLM requires that all hay used on BLM lands be certified weed free. This is a statewide policy which applies to the Monument, as well as all other BLM lands in the State of Utah. Second is the requirement that all machinery that has been used outside the Monument be cleaned prior to use in the Monument. This provision generally applies to contract equipment used for projects such as construction of facilities and firefighting equipment. Both of these provisions would help reduce the introduction and spread of noxious weed species in the Monument. For major removal projects, monitoring plots would be established in key areas to determine effectiveness of methods and presence of noxious weed species. All projects would contain restoration and/or revegetation protocols to minimize re-colonization of treated areas by noxious weed species. Monitoring in these areas would be part of the adaptive management framework described in Appendix 3.

### **Forestry Products**

Fuelwood (green or dead and down) harvesting, post cutting, and Christmas tree cutting would be allowed by permit only within designated areas (Map 2.2). There are currently two fuelwood cutting areas located in the Monument: Rock Springs Bench area and Buckskin Mountain area. More areas may be designated to meet the overall vegetation management objectives, but would not be allowed outside already disturbed areas. All cutting areas would be designated under a permit system, with maps provided to assure compliance. Off-highway vehicle restrictions discussed in previous sections would apply to all of these activities and vehicular travel would be allowed only on designated routes. Vehicles would be permitted to pull no more than 50 feet off of a designated route in designated wood cutting areas to load fuelwood in the Outback Zone, the same as is allowed for accessing dispersed primitive camping areas in that zone.

No commercial timber harvesting is authorized within the Monument. Commercial fuelwood cutting would be limited and authorized in designated areas only to accomplish the vegetation management objectives.

### **Native Vs. Non-native Plants**

In keeping with the overall vegetation objectives and Presidential Executive Order 11312, native plants would be used as a

# Map 2.2: Forestry Product Areas

- Principal Communities
- ▬ Monument Boundary
- ▬ Highways 89 & 12
- ▬ Other Roads
- Buckskin Mtn.
- Rock Springs Bench

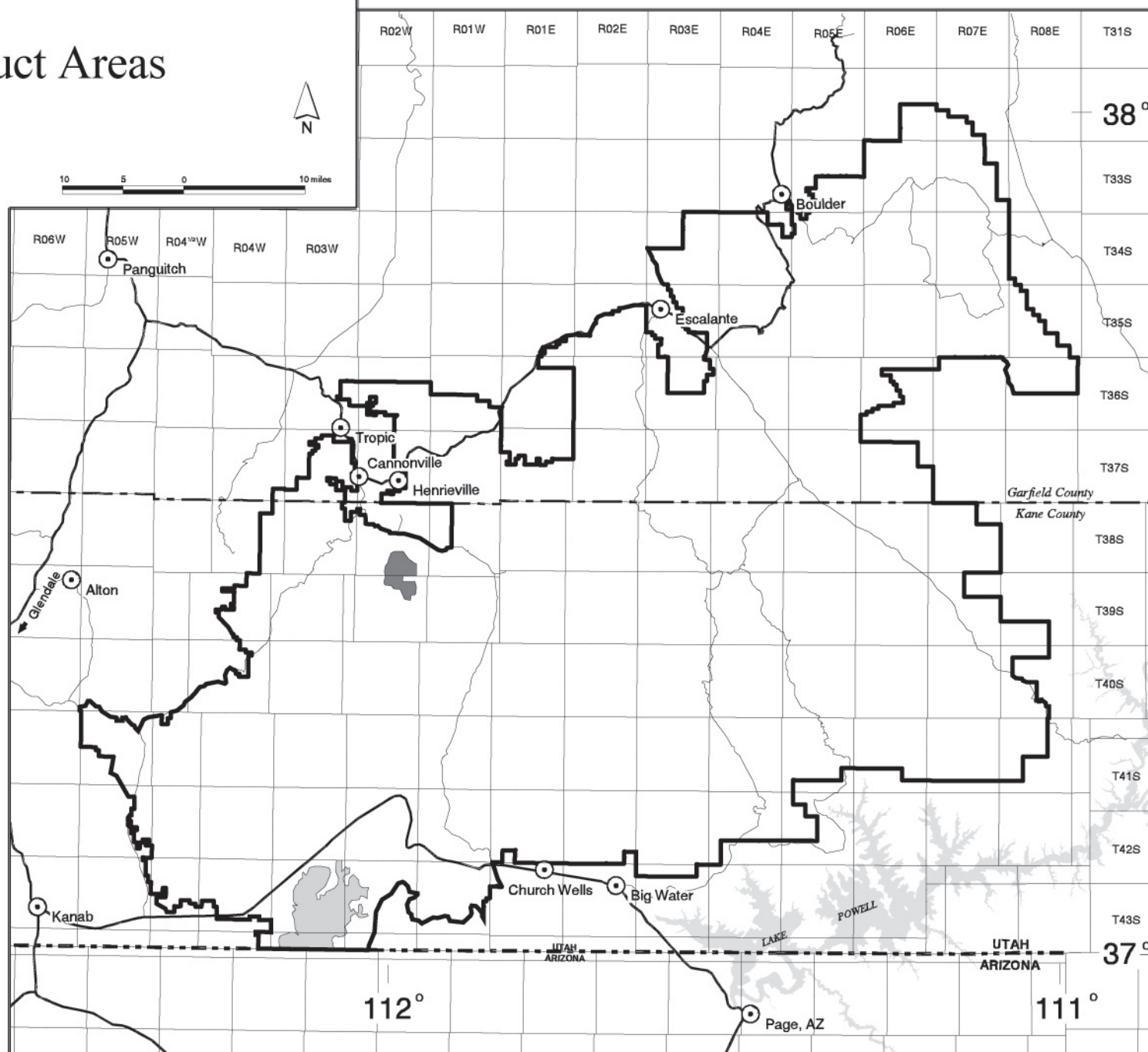


Location Map

Data has been gathered from a variety of sources and has been integrated to provide a planning context. The data shown outside the Monument may not have been verified. This map represents available information, and should not be interpreted to alter existing authorities or management responsibilities.



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Grand Staircase-Escalante  
National Monument  
1999



priority for all projects in the Monument. There are limited, emergency situations where it may be necessary to use non-native plants in order to protect Monument resources by stabilizing soils and displacing noxious weeds. This use would be allowed, on a limited emergency basis, to the extent that use complies with the vegetation objectives, Presidential Executive Order 11312, and the *Standards for Rangeland Health and Guidelines for Grazing Management for BLM Lands in Utah* (1997). In these situations, short-lived species (i.e., nurse crop species) would be used and would be combined with native species to facilitate the ultimate establishment of native species. All projects proposed in the Monument would contain a restoration or revegetation component and would budget for the cost of seeding with native species. All planning for projects, in all except limited, emergency situations, would use native species, and the use of non-native species would not be analyzed as an alternative.

Non-native plants may also be used for restoration related research, if the use is consistent with and furthers the overall vegetation management objectives, and after consultation with the GSENM Advisory Committee. Non-native plants could not be used to increase forage for livestock and wildlife. If non-native plants are used in an area, monitoring plots would be established to document changes in vegetation structure and composition and would be an integral part of the adaptive management framework.

#### **Re seeding after Fires**

When deciding whether to reseed after fires, there are many factors that should be considered. The overriding consideration is the vegetation management objective and priority to use native plants. In trying to make the determination of whether seeding would help attain these objectives, there are other considerations: (1) the structure and diversity of vegetation in the area before it burned, and (2) the presence of noxious weeds in the area and the likelihood of such weeds increasing as a result of a fire. Areas with high species diversity and little potential for noxious weed spread would not be reseeded. Areas that had little diversity and little potential for noxious weed invasion would be seeded with native species exclusively. Areas of low diversity and high potential for noxious weed invasion would most likely be seeded, and non-natives/native seed mixes could be used if it was determined that timing was critical and non-native species would help prevent weed spread. Each fire would have to be evaluated on a case-by-case basis to determine the appropriate actions to meet the established vegetation management objectives. Actions may change over time as a result of new research or other information in accordance with the adaptive management framework outlined in Appendix 3. If seeding with non-natives is deemed necessary, it would be in accordance with the provision stated above (short-lived, nurse crop species with natives in the mix).

The use of aircraft in reseed operation may be allowed in areas as appropriate. In areas with raptor species, timing would be appropriate to eliminate impacts to these species.

#### **Restoration and Revegetation**

Although the terms revegetation, restoration, reclamation, and rehabilitation are often used interchangeably to describe placing vegetation back into an area after disturbance, they are very different processes and concepts. Rehabilitation and reclamation are both ambiguous terms which can imply either restoration or revegetation depending on the situation. Due to the ambiguity of these terms they will not be used here. Restoration and revegetation would both be used in the Monument and, although they can be similar in implementation, are very different concepts. As such, they will be discussed separately and used in situations where appropriate.

Restoration is the process of returning disturbed areas to a natural array of native plant and animal associations. Although this may sound easy, success rates are low and restoration to pre-disturbance condition is often difficult if not impossible to achieve. In order to maximize the success of restoration, projects are most often in areas away from development, with little use, where restoring the natural processes and functions of the vegetation is desired. Restoration not only denotes the return of the vegetation to the site,



but also the return of the entire system functions that existed prior to disturbance. This includes the return of soil characteristics, water relations, associated wildlife and non-dominant plants that are often omitted from most projects.

Revegetation is the process of putting vegetation back in an area where vegetation previously occurred. In this case, the species, their density, and their location in relation to one another, may or may not simulate natural conditions. The objective of revegetation projects is to stabilize areas that are disturbed, often from overuse by human activities, and to prevent further degradation of a site. Revegetation is also used to reduce the visual contrast between the disturbed area and the existing landscape where use would prevent a return to predisturbance conditions. This type of project often uses native species that are easy to establish, drought tolerant, and simple to propagate.

Many factors need to be considered when deciding to implement a revegetation or restoration strategy. Each project and area to be treated must be evaluated to determine the appropriate strategy. There are some general guidelines that can be applied to determine which strategy is the most appropriate and how it would be implemented in order to be consistent with the overall vegetation management objectives.

1. Restoration would be the goal whenever possible (i.e., an attempt would be made to return disturbed areas to conditions

which promote a natural array of native plant and animal associations).

2. Species used in both restoration and revegetation projects would comply with the non-native plant policy described above (i.e., native plants would be used as a priority).
3. Revegetation strategies would be used in areas of heavy visitation, where site stabilization is desired.
4. Restoration provisions would be included in all surface disturbing projects including provisions for post restoration monitoring of the area. Costs for these activities would be included in the overall cost of the project and would come out of the entire project budget.
5. Priority for restoration or revegetation would be given to projects where Monument resources are being damaged.

These sites would likely be in areas near development and/or heavy visitor use. Although these areas are more likely to be candidates for revegetation projects, careful evaluation of disturbed sites needs to be conducted to include desired future condition of an area. Restoration of areas receiving heavy use may include limits on visitor use in order to promote recovery.

## **WATER-RELATED DEVELOPMENTS (Non-Culinary)**

Water developments could be used as a management tool throughout the Monument for the following purposes: better distribution of livestock when deemed to have an overall beneficial effect on Monument resources, including water sources or riparian areas, or to restore or manage native species or populations. They could be done only when there is no other means to achieve the above objectives and only when the water development would not jeopardize or dewater streams or springs. Developments would not be permitted to increase overall livestock numbers. All developments would be subject to NEPA analysis. Maintenance of existing developments could continue, but may require NEPA analysis and would have to be consistent with the objectives of this Plan.

## **WILDFIRE MANAGEMENT**

Vegetation in the Monument generally evolved with fire as a minor part of the ecosystem, as is evident from the flora and soil characteristics. Periodic fires did occur in the Monument, but little information is known about the frequency or size of these fires. The objective of the fire management program would be to allow fire to play its natural role in the ecosystem. Management ignited fires may be initiated in areas where fire suppression has disrupted natural fire regimes. A full discussion on the use of management ignited fire as a tool is discussed

in the **Vegetation Management** section in this chapter. Specific objectives for management ignited fire would be developed prior to its use and with recommendations from the GSENM Advisory Committee.

For all fire activities, the Monument is part of the Color Country Interagency Fire Management Area. This area includes Iron, Washington, Beaver, Kane, and Garfield Counties in Utah, and the BLM Arizona Strip Field Office lands of Mohave County in Arizona. This area was established to share resources in southwestern Utah and northwestern Arizona. An operating plan outlining agency responsibilities and organizational structure for suppression activities is updated annually. Specific zoned areas and policies have been established to indicate how suppression activities would be managed in the specific areas of the Monument. Most of the Monument is included in zones that have little fire suppression activity. Some full suppression zones occur within the Monument, found in areas where protection of structures and property are a concern. Protection of other resources is fully integrated into the fire management strategies for all of the zones in southern Utah and northern Arizona. Heavy equipment use is allowed through authorization of the Monument Manager. Changes in specific zone strategies may be updated on an annual basis to assure appropriate action is taken for fire suppression in a given area. All changes in zones and activities would be coordinated

with the Color Country Fire Management Area staff following established processes. A designated fire resource advisor familiar with WSA issues would be consulted on all fires within the Monument that involve WSAs.

### **WILDLIFE SERVICES**

Wildlife Services (formerly Animal Damage Control) activities within the Monument would be limited to the taking of individual coyotes within the immediate vicinity after verified livestock kills, where reasonable livestock management measures to prevent predation had been taken and had failed. Reasonable livestock management measures could include preventative measures to control predation, such as managing where calving occurs, in order to develop improved land management practices. No traps, poisons, snares, or M44s would be allowed in the Monument due to safety concerns and potential conflicts with Monument resources. Consistent with the Proclamation, bear and mountain lion populations would be managed under State regulations through the Division of Wildlife Resources. This includes regulations for hunting and regulations covering depredating bears and mountain lions.

### **WITHDRAWAL REVIEW**

The Proclamation establishing the Monument states: "All Federal lands and interests in lands within the boundaries of this Monument are hereby appropriated and withdrawn from entry, location, selection, sale, leasing, or other disposition under the public land laws..." The Proclamation also states: "Nothing in this Proclamation shall be deemed to revoke any existing withdrawal, reservation, or appropriation; however, the National Monument shall be the dominant reservation." This statement refers to any lands within the Monument that have been removed or withdrawn from operation under some or all of the public land laws (such as mining and/or mineral leasing laws) by statute or Secretarial order prior to the Proclamation. These withdrawals were imposed to achieve a variety of purposes, and they remain in effect until specifically revoked, or otherwise expire. Many were established prior to the enactment of FLPMA in 1976. Table 2.3 summarizes all existing withdrawals in the Monument.

The BLM would continue to review withdrawals within the Monument to determine their consistency with the intent of the withdrawal. Any withdrawals no longer meeting their intended purpose would be terminated under section 204 (l) of FLPMA. Where appropriate, existing withdrawals could also be modified or revoked under Section 204 (a) of FLPMA to implement the objectives of this Plan.

**Table 2.3**  
**Withdrawals/Classifications**

Number	Type	Acres
248	Public Water Reserves	12,035.25
10	Reclamation Withdrawals	17,496.00
3	Recreation Classifications	7,940.00
1	Withdrawal for FERC Project #2219	131.55
1	Withdrawal for FERC Project #2642	57.14
1	Wolverine Petrified Wood Area	1,520.00
1	Escalante Canyons ONA	1,160.00
1	Devils Garden ONA	640.00
1	North Escalante Canyon ONA	5,800.00
1	The Gulch ONA	3,430.00
1	Phipps-Death Hollow ONA	34,300.00
1	Calf Creek Recreation Area	5,835.00
1	Deer Creek Recreation Area	640.00
1	Dance Hall Rock Historic Site	640.00

## SPECIAL EMPHASIS AREAS

### AREAS OF CRITICAL ENVIRONMENTAL CONCERN

Areas of Critical Environmental Concern (ACEC) are areas within the public lands where special management attention may be required to protect important historic, cultural, or scenic values, fish and wildlife resources, or other natural systems or processes, or to protect human life and safety from natural hazards.

The BLM is required to consider designating ACECs as part of the planning process. FLPMA provides for ACEC designation and establishes National policy for the protection of public land ACECs.

The BLM called for ACEC nominations within the Monument in March of 1998. In addition, twenty-two nominations were brought forward from earlier planning efforts. Appendix 10 lists the ACEC nominations received for this planning process and describes the ACEC evaluation methods used. After careful evaluation of the resources recognized in each of the nominations, it was determined that their protection would be substantially equivalent under either Monument authority or ACEC designation. Therefore, it was concluded that no ACECs were necessary, and that no ACECs would be designated under the Monument Management Plan.

## SPECIAL MANAGEMENT DESIGNATIONS

All existing special management designations are consistent with the Proclamation and the objectives of this Plan. It is recommended that the following designations (Map 2.3) would be continued:

- C Calf Creek Recreation Area
- C Deer Creek Recreation Site
- C Devils Garden Outstanding Natural Area
- C Dance Hall Rock Historic Site
- C Escalante Canyons Outstanding Natural Area (tracts 2, 3, 4 are included in North Escalante Canyon/The Gulch ISA and Tract 1 and 5 are separate)
- C North Escalante Canyon Outstanding Natural Area
- C The Gulch Outstanding Natural Area
- C Phipps-Death Hollow Outstanding Natural Area
- C No Mans Mesa
- C Wolverine Petrified Wood Area

## SPECIAL RECREATION MANAGEMENT AREAS

Special Recreation Management Areas (SRMA) are areas where more intensive recreation management may be needed because the area would be a focal point for visitation (Highway 12 and 89 corridors) or because recreational uses within the area need to be closely managed or limited to prevent conflicts with Monument resources

# Map 2.3: Special Management Designations

- Principal Communities
- Monument Boundary
- Highways 89 & 12
- Other Roads

- 1 Calf Creek Recreation Area
- 2 Dance Hall Rock Historic Site
- 3 Deer Creek Recreation Site
- 4 Devils Garden Outstanding Natural Area
- 5 Escalante Canyons Outstanding Natural Area
- 6 No Mans Mesa Research Natural Area
- 7 North Escalante Canyon Outstanding Natural Area
- 8 Phipps-Death Hollow Outstanding Natural Area
- 9 The Gulch Outstanding Natural Area
- 10 Wolverine Petrified Wood Natural Environmental Area

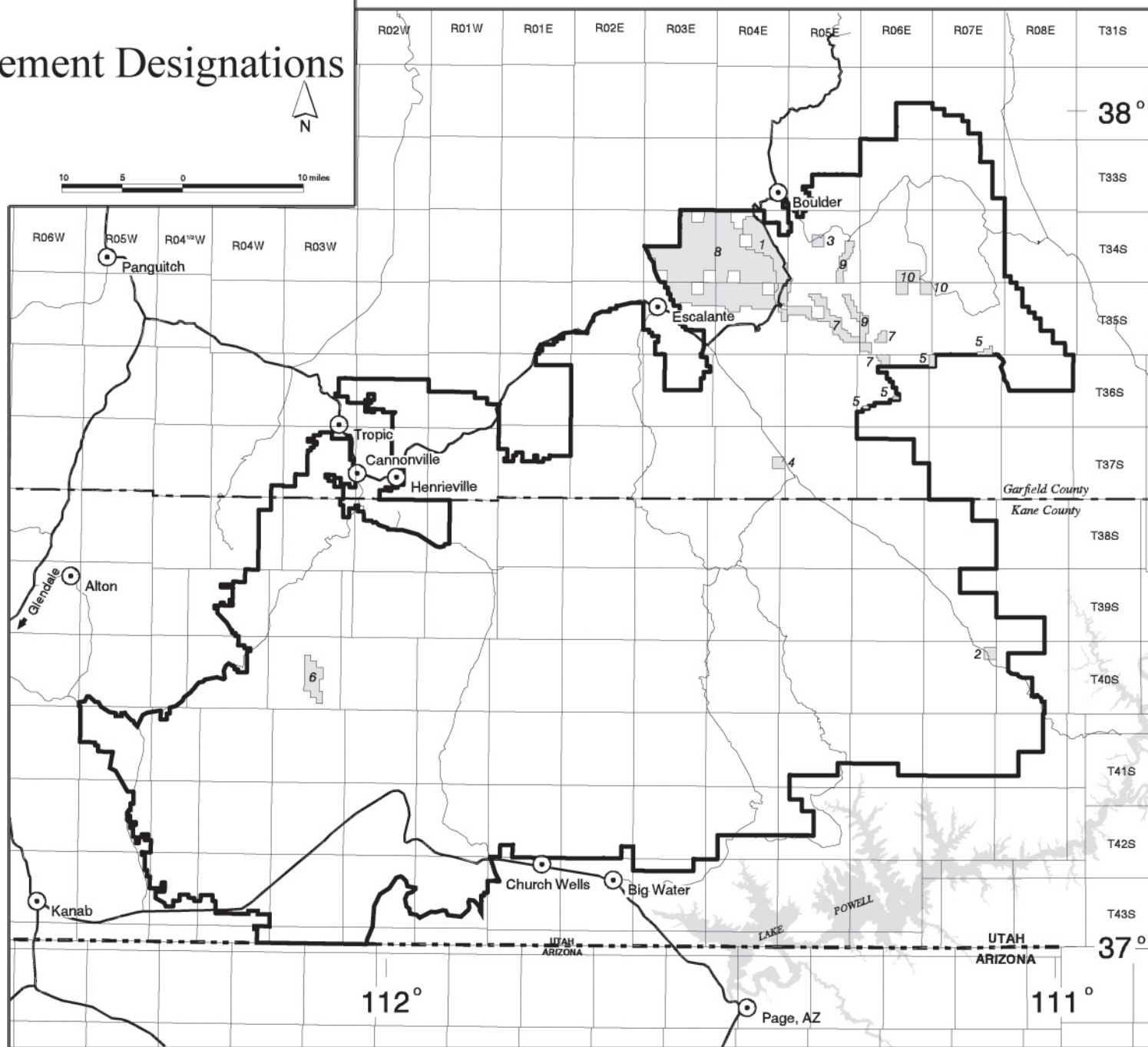


## Location Map

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(Escalante Canyons, Paria/Hackberry, and Fiftymile Mountain).

The Escalante Canyons, Paria/Hackberry, and Paria Canyons and Plateaus would continue to be managed as Special Recreation Management Areas. Fiftymile Mountain, the Highway 12 Corridor, and the Highway 89 Corridor would also be SRMAs (Map 2.4). Management objectives for these areas are outlined below. Management of these areas would be accomplished through subsequent integrated activity plans as discussed in Appendix 3.

#### **Escalante Canyons SRMA**

**Area Description:** The boundary line would follow the geographical topography including all the tributaries to the main Escalante Canyon. It would include trailheads for all the popular routes into the canyons.

**Activities include:** backpacking, canyoneering, non-motorized boating, and equestrian use.

**Desired Future Condition:** The overall recreation experience would continue to be primitive, uncrowded and remote. Overall social encounters would remain low compared to other southwest canyon hiking opportunities. However, a range of social encounters would be available, from experiences where parties would be encountered to experience where there would be little or no contact with others. People

would be able to make informed decisions about which recreation opportunities meet their desires, and have their expectations met. Monument resources would not be impaired. Potential permit systems could address general public, commercial, and administrative users.

#### **Paria/Hackberry SRMA**

**Area Description:** This area would be bordered on the west by Kitchen Canyon Road, on the east by Cottonwood Canyon Road corridor, on the south by the confluence of Hackberry/Cottonwood Creeks and the Paria River, and on the north by Dixie National Forest, excluding the Skutumpah corridor.

**Activities include:** backpacking, canyoneering, and equestrian use.

**Desired Future Condition:** The overall recreation experience would continue to be primitive, uncrowded and remote. Equestrian opportunities would be emphasized in Paria Canyon, while backpacking opportunities would be emphasized in Hackberry Canyon. Potential permit systems could address general public use and commercial users.

#### **Paria Canyons and Plateaus SRMA**

**Area Description:** This area encompasses Buckskin Mountain, West Clark Bench, and Cedar Mountain to connect to the BLM Arizona Strip's "Canyons and Plateaus of the Paria Resource Conservation Area." These areas are located south of Highway 89, with the Monument boundary marking the east boundary.

**Activities include:** canyoneering, equestrian use, backpacking, hiking, hunting, and scenic touring along the House Rock Valley Road.

**Desired Future Condition:** The overall recreation experience would continue to be primitive, uncrowded and remote. Overall social encounters would remain low compared to other southwest canyon hiking opportunities. However, a range of social encounters occur. People would be able to make informed decisions about which recreation opportunities meet their desires, and have their expectations met.

Scenic touring on the House Rock Valley Road would accommodate passenger cars most of the time. Use along the road could become moderate.

Management of this SRMA would be in coordination with the Kanab and the Arizona Strip Field Offices.

**Fiftymile Mountain SRMA**

Area Description: Geographical area called Fiftymile Mountain including trail access points.

Activities include: equestrian use, backpacking, and hunting.

Desired Future Condition: The recreation experience would be primitive, uncrowded and remote. Visitors would not be encouraged to go to this area and commercial outfitting would be extremely limited.

**Highway 12 Corridor SRMA**

Area Description: The Highway 12 corridor located in the Monument, including Calf Creek Campground and Interpretive Trail.

Activities include: scenic driving, day use hiking, camping, equestrian use, road bicycling, scenic and interpretive viewing.

Desired Future Condition: The recreation experience would focus on learning about geology, history, archaeology, biology, and paleontology, in addition to scenic viewing. Short interpretive trails and scenic overlooks would be developed to encourage visitors to learn more about these Monument resources. Opportunities would accommodate all visitors. Information stations located in Boulder, Escalante, and Cannonville would disseminate educational materials to further information about these resources.

**Highway 89 Corridor SRMA**

Area Description: Highway 89 corridor located in the Monument. This SRMA would encompass the Paria Movie Set, the old Pahreah townsite, and the Paria Contact Station.

Activities include: scenic driving, day-use hiking, camping, road and mountain bicycling, scenic and interpretive viewing.

Desired Future Condition: The recreation experience would focus on learning about geology, history, archeology, biology, and paleontology in addition to scenic viewing. Short interpretive trails and scenic overlooks would be developed to encourage visitors to learn more about these Monument resources. Opportunities would accommodate all visitors. This corridor would be coordinated with the Vermilion Cliffs Highway Project.

**VISUAL RESOURCE MANAGEMENT**

The wealth of landforms, geology, colors, elevation changes, and vegetation types in the Monument contribute to its outstanding scenery. The BLM's objective would be to preserve these spectacular scenic assets in "this high, rugged, remote region, where bold plateaus and multi-hued cliffs run for distances that defy human perspective..." (Proclamation 6920, 1996)

Visual Resource Management (VRM) would be used as one tool to meet this objective (other visual resource requirements are

discussed below). An inventory of visual resources, using the procedures specified in the BLM's Visual Resource Inventory Manual H-8410-1, was updated after the Monument was established. The updated visual inventory classes were developed using higher sensitivity ratings due to the high visibility and sensitivity of visual resources associated with a National Monument.

Utilizing the results of the visual resource inventory and other resource allocation considerations, 68 percent of the lands within the Monument would be assigned to VRM Class II and 32 percent of the lands within the Monument would be assigned to VRM Class II, as shown on Map 2.5.

These VRM Class assignments reflect the visual resource analysis inventory upgraded in those areas where the BLM deemed that higher management class objectives were appropriate. This upgrade included shifting all Class IV areas into surrounding Class II or III areas based on public comment and the desire to have higher visual management objectives in those areas. The VRM class objectives are as follows:

**Class II:** The objective of this class is to retain the existing character of the landscape. The level of change to the characteristic landscape should be low. Management activities may be seen, but should not attract the attention of the casual observer. Any changes must repeat the basic elements of

# Map 2.4: Special Recreation Management Areas

- Principal Communities
- Monument Boundary
- Highways 89 & 12
- Other Roads
- Escalante Canyons
- Highway 12 Corridor
- Paria Canyons and Plateaus
- Paria/Hackberry
- Fiftymile Mountain
- Highway 89 Corridor

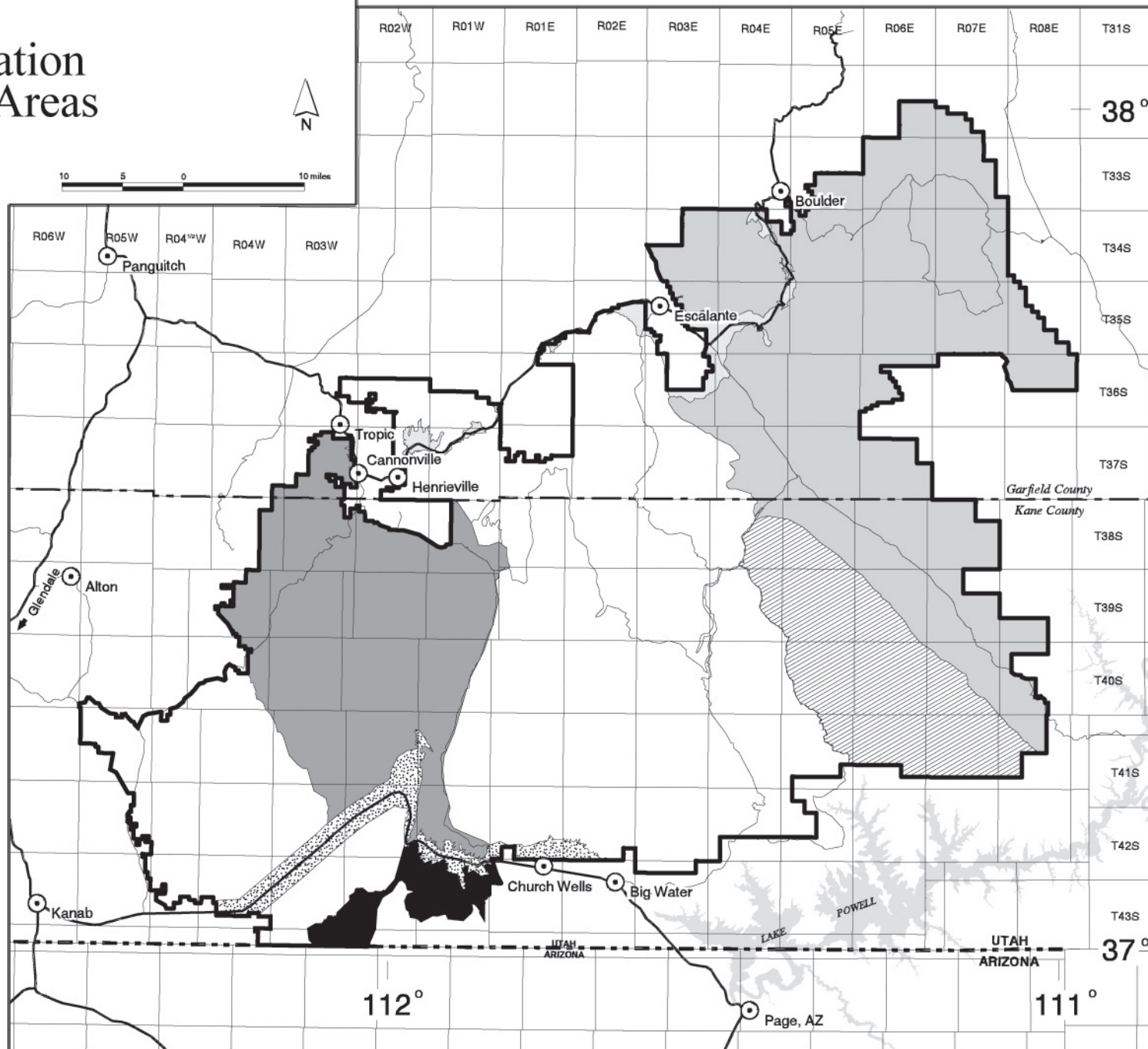


## Location Map

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# Map 2.5: Visual Resource Management Inventory Classes

- Principal Communities
- ▬ Monument Boundary
- ▬ Highways 89 & 12
- ▬ Other Roads
- Class II
- Class III

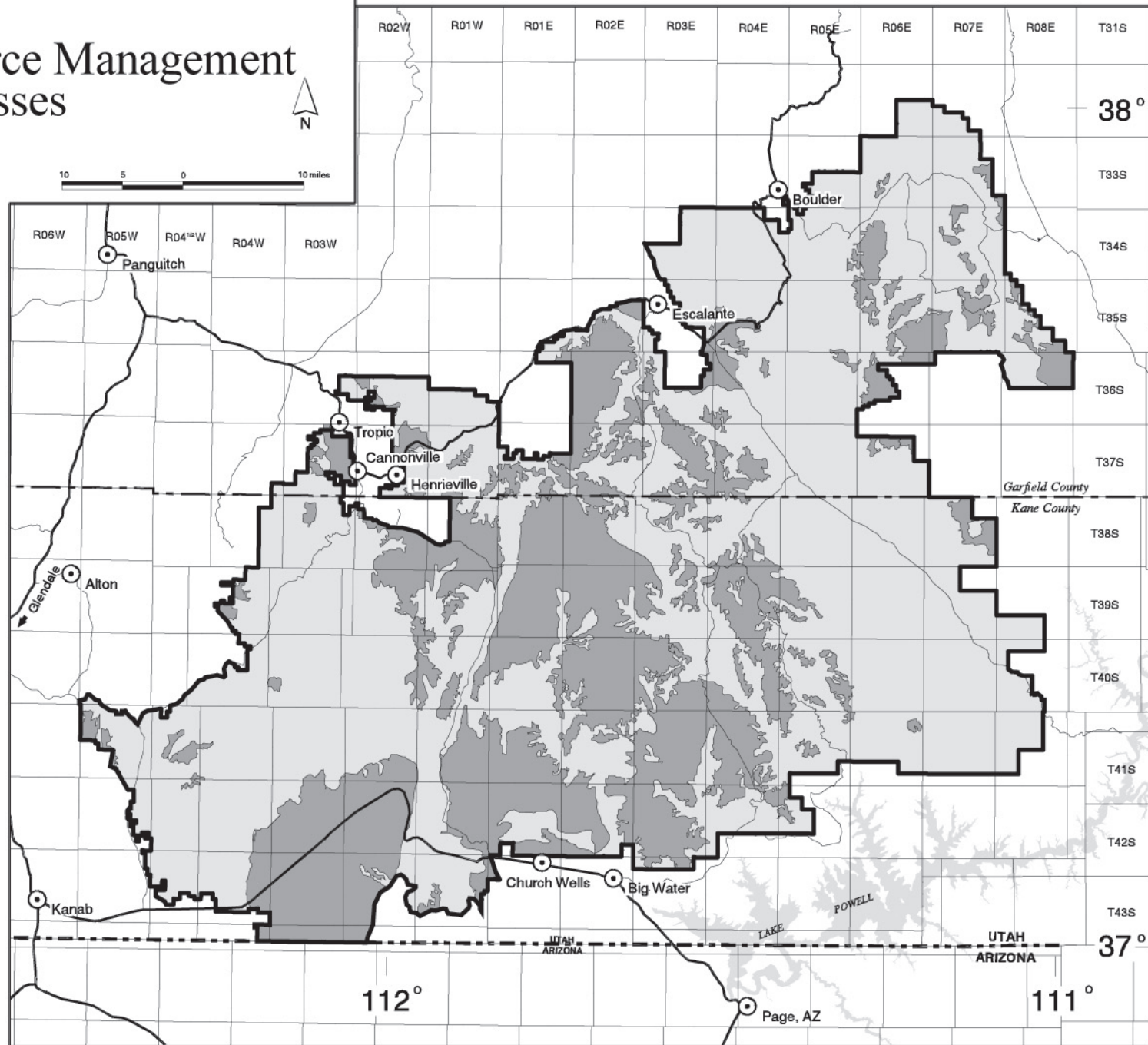


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form, line, color, and texture found in the predominant natural features of the characteristic landscape.

**Class III:** The objective of this class is to partially retain the existing character of the landscape. The level of change to the characteristic landscape should be moderate. Management activities may attract attention but should not dominate the view of the casual observer. Changes should repeat the basic elements found in the predominant natural features of the landscape.

All proposed actions must consider the importance of visual values and must minimize the impacts the project may have on these values. While performing an environmental analysis for projects, the visual resource contrast rating system would be utilized as a guide to analyze potential visual impacts of the proposal. Projects would be designed to mitigate impacts and conform to the assigned VRM Class objective and other objectives including: (1) using natural or natural appearing material as a priority, (2) meeting restoration/revegetation objectives, and (3) complying with the Monument Facilities Master Plan.

Some types of projects such as rights-of-way requests, valid existing rights, or ingress to private land may be allowed on a case-by-case basis in Class II or III areas. Visual resource impacts in these instances would be minimized by such measures as screening,

painting, project design, relocation, or restoration.

The Monument Manager may allow temporary projects, such as research projects, to exceed VRM standards in Class II-III areas, if the project terminates within two years of initiation. Rehabilitation would begin at the end of the two year period. During the temporary project, the Manager may require phased mitigation to better conform with prescribed VRM standards.

The VRM classes acknowledge existing visual contrasts. Existing facilities or visual contrasts would be brought into VRM class conformance to the extent practicable when the need or opportunity arises (i.e., rights-of-way renewals, mineral material site closures, abandoned mine rehabilitation).

Areas that are designated Wilderness or designated a wild section of a National Wild and Scenic River in the Monument would be reassigned to Class I VRM Class objectives at the time the law creating Wilderness or National Wild and Scenic River becomes effective.

### WILD AND SCENIC RIVERS

In this Plan, 223 miles of river segments would be determined suitable and would be recommended for Congressional designation into the National Wild and Scenic River System. The suitable river segments include: Escalante River 1, 2, 3; Harris Wash; Lower Boulder Creek; Slickrock Canyon; Lower

Deer Creek 1, 2; The Gulch 1, 2, 3; Steep Creek; Lower Sand Creek and tributary Willow Patch Creek; Mamie Creek and west tributary; Death Hollow Creek; Calf Creek 1, 2, 3; Twenty-five Mile Wash; Upper Paria River 1, 2; Lower Paria River 1, 2; Deer Creek Canyon; Snake Creek; Hogeye Creek; Kitchen Canyon; Starlight Canyon; Lower Sheep Creek; Hackberry Creek; Lower Cottonwood Creek; and Buckskin Gulch.. The suitable segments are shown on Maps 2.6 and 2.7. Rationale for suitability determinations for all segments are found in Appendix 11.

The BLM would manage suitable segments for the preservation of outstandingly remarkable values. River segments determined non-suitable would be managed under the direction and prescriptions of this Plan. While found non-suitable for wild and scenic status, these river segments have values that would be protected under the prescriptions of this Plan.

### WILDERNESS STUDY AREAS

Wilderness preservation is part of the BLM's mandate. Pursuant to this mandate, certain areas within the Monument have been identified for Wilderness review. The purpose of these areas, referred to as Wilderness Study Areas (WSAs), is to protect potential wilderness values until further study is completed, recommendations on their suitability for Wilderness designation are

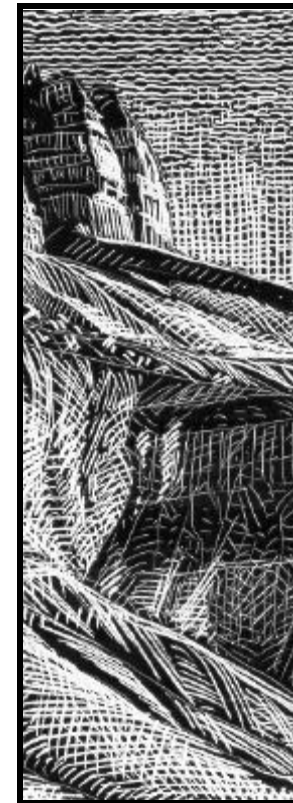
made, and legislation takes effect to designate them as part of the National Wilderness Preservation System or release them from further study or protection.

The Monument contains 16 WSAs, totaling approximately 880,857 acres<sup>6</sup>, or about 47 percent of the BLM acres in the Monument (Table 2.4 and Map 2.8). These WSAs were identified in a 1978-80 inventory as having wilderness character and thus worthy of further study to determine their suitability for designation as part of the National Wilderness Preservation System. In 1990, the Utah Statewide Final Environmental Impact Statement analyzed the suitability of the WSAs for designation, and in 1991, the Utah Statewide Wilderness Study Report made suitability recommendations to Congress. Further recommendations on wilderness suitability are outside the scope of this Plan. The 1999 Utah Wilderness Inventory and Section 202 Planning Process is described below.

Existing WSAs in the Monument would be managed under the BLM's Interim Management Policy (IMP) and Guidelines for Lands Under Wilderness Review (BLM Manual H-8550-1) until legislation takes effect to change their status. The major objective of the IMP is to manage lands under wilderness review in a manner that does not impair their suitability for designation as wilderness. In general, the only activities permissible under the IMP are temporary uses that create no new surface disturbance nor involve permanent

placement of structures. Temporary, non-disturbing activities, as well as activities governed by valid existing rights, may generally continue in WSAs.

Actions allowed under the IMP would also be subject to other BLM laws and policies that govern the use of public land, including management prescriptions or other restrictions developed in this Plan (where they are consistent with the IMP). It is important to note that some uses and activities described in this Plan may not be achievable under the IMP. For example, the Frontcountry Zone overlaps WSAs in several places, generally along Highways 12 and 89 (Map 2.9). The Frontcountry Zone could allow activities such as interpretive structures that would not be allowed in the WSA under IMP. The reason for this inconsistency is that zone boundaries were drawn with topography and dominant terrain features in mind, along with other management considerations such as providing some areas along routes for appropriate facilities such as pullouts. In any case, where conflicts occur between the zone prescriptions and IMP, IMP would take precedence until action is taken by Congress to either designate them or release them from further protection. This Plan and zone prescriptions would apply to any and all public land within the Monument if Congress releases them from WSA status.



# Map 2.6: Escalante Drainage Wild and Scenic Rivers Suitable Segments

- Principal Communities
- ▬ Highway 12
- ▬ Burr Trail/  
Hole-in-the-Rock Road
- RIVER CLASSES**
- ▬ Wild
- ▬ Scenic
- ▬ Recreational

5 0 5 miles

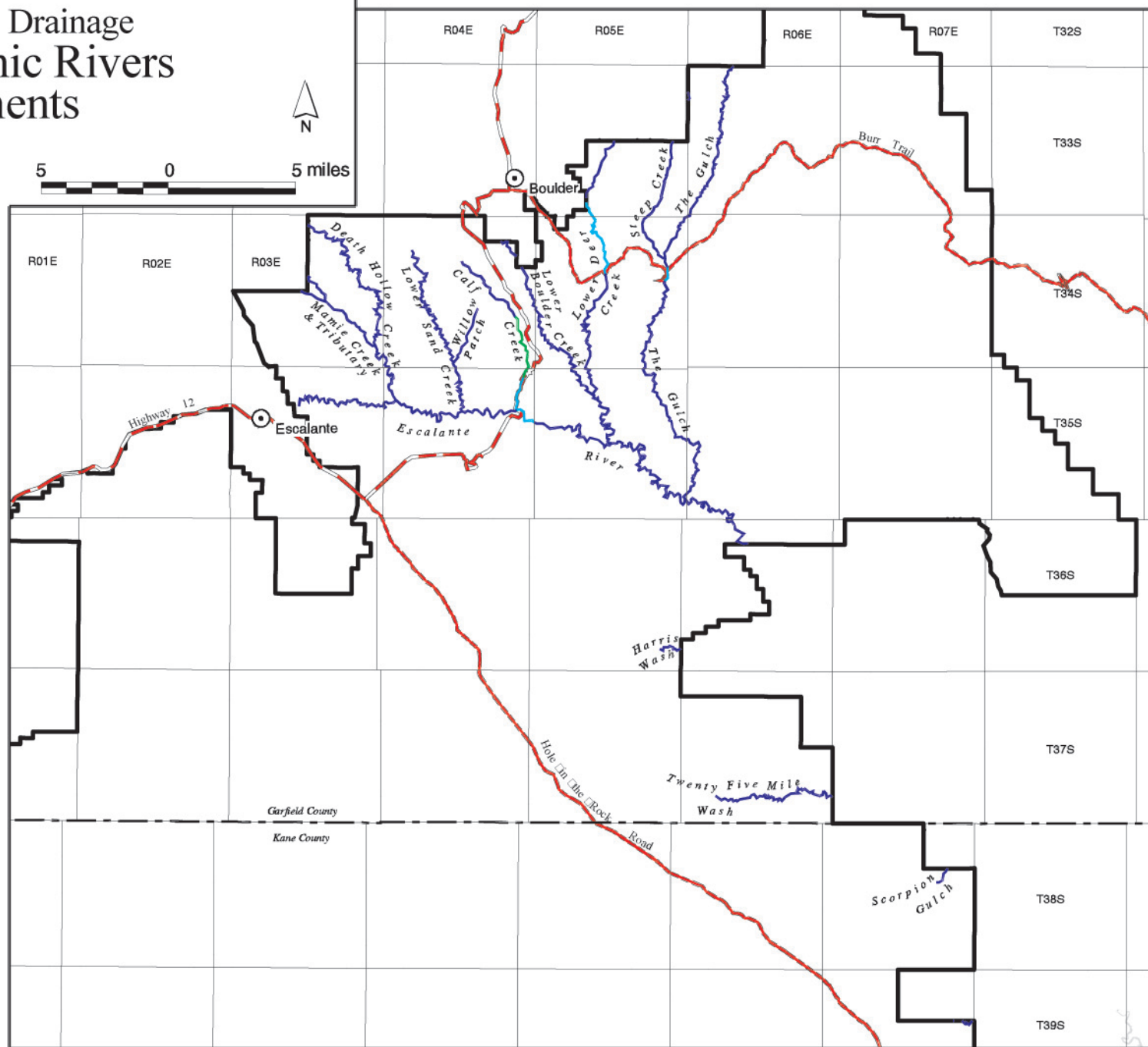


## Location Map

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# Map 2.7: Paria Drainage Wild and Scenic Rivers Suitable Segments

- Principal Communities
- Highway 89
- Cottonwood Road/  
Skutumpah Road
- RIVER CLASSES**
- Wild
- Recreational

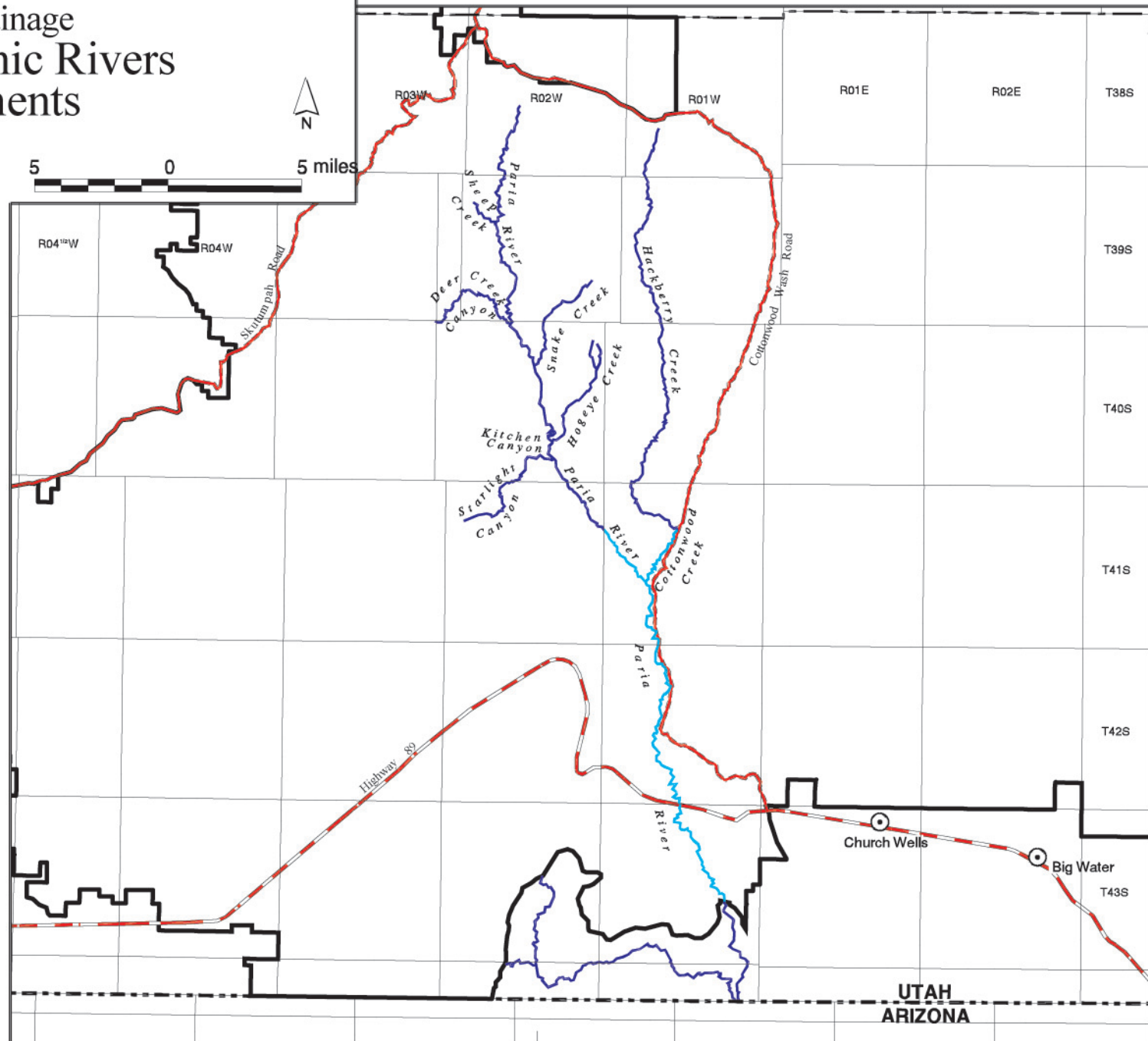


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# Map 2.8: Wilderness Study Areas

- Principal Communities
- Monument Boundary
- Highways 89 & 12
- Other Roads
- Burning Hills
- Carcass Canyon
- Death Ridge
- Devils Garden
- Escalante Canyons Tract 5 ISA Complex
- Fifty Mile Mountain
- Mud Spring Canyon
- North Escalante Canyons/ The Gulch ISA Complex
- Paria-Hackberry/ Paria-Hackberry 202
- Phipps-Death Hollow ISA Complex
- Scorpion
- Steep Creek
- The Blues
- The Cockscomb
- Wahweap

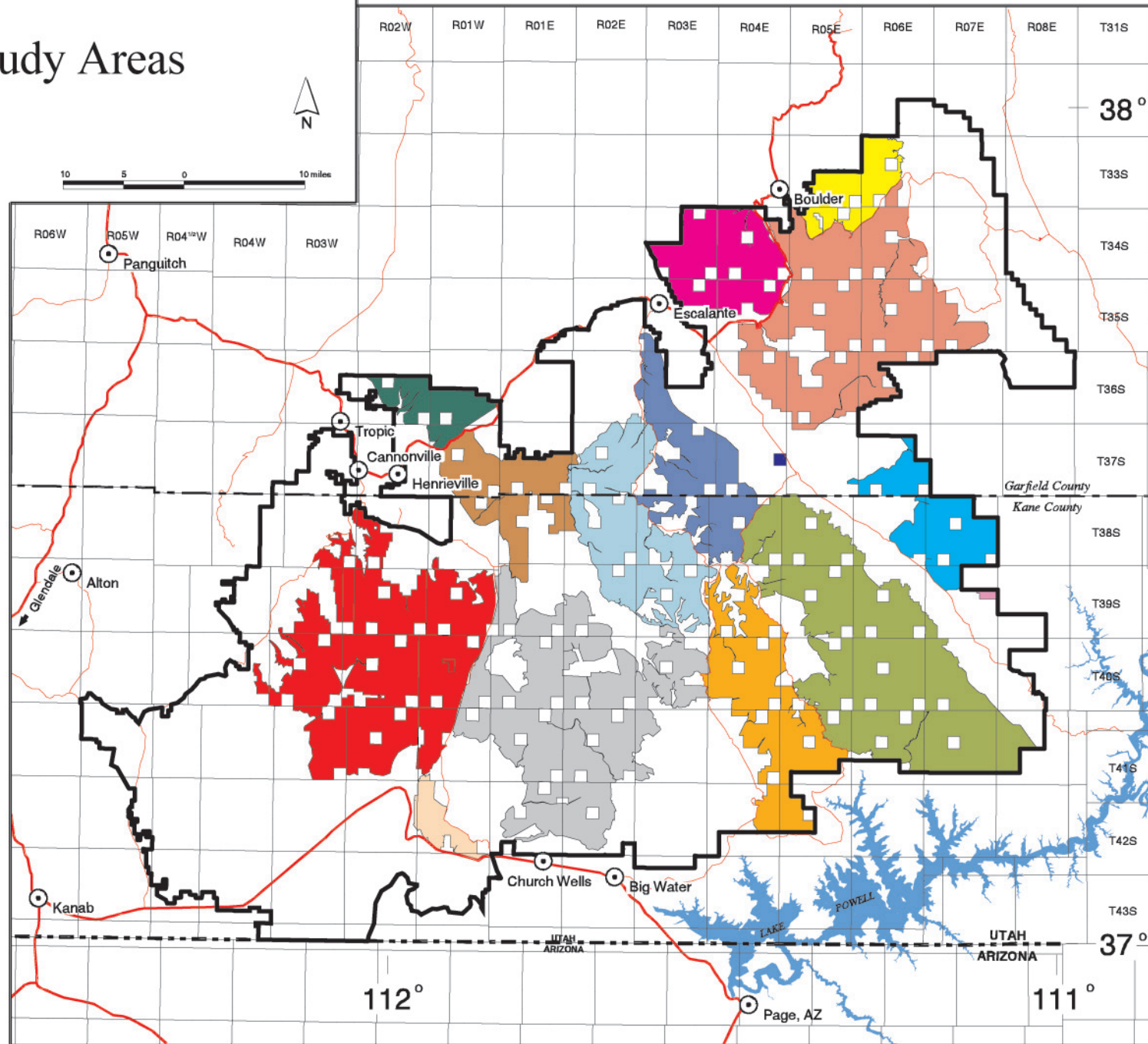


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# Map 2.9: Management Zones and Wilderness Study Areas

- Principal Communities
- ▬ Monument Boundary
- ▬ Highways 89 & 12
- ▬ Other Roads
- Frontcountry
- Passage
- Outback
- Primitive
- Wilderness Study Areas

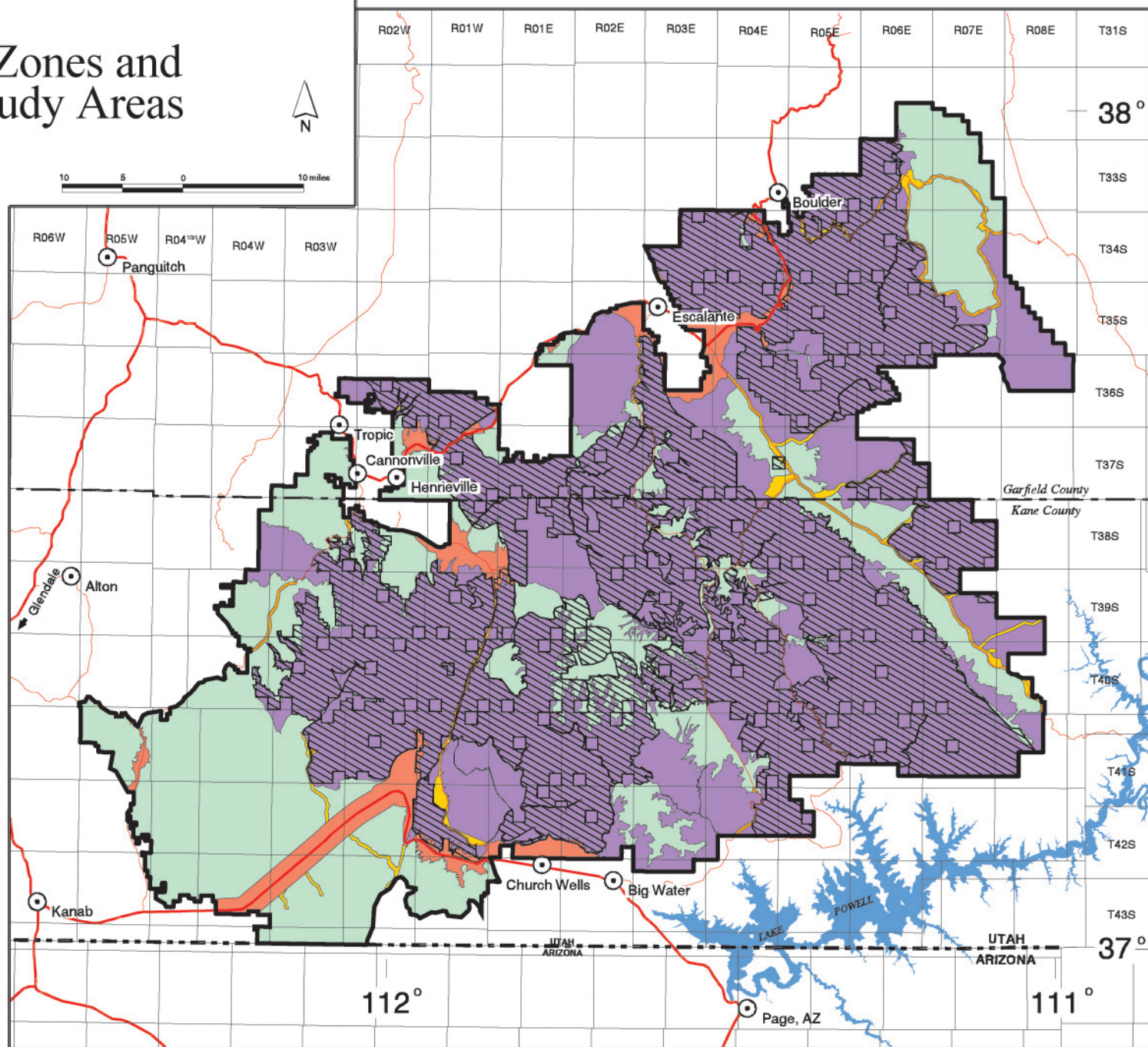


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**Table 2.4**  
**Wilderness Study Areas**

Name	Acres*
Phipps-Death Hollow Instant Study Area (ISA)	42,731
Steep Creek Wilderness Study Area (WSA)	21,896
North Escalante Canyons/The Gulch ISA	119,752
Carcass Canyon WSA	46,711
Scorpion WSA	35,884
Escalante Canyons Tract 1 ISA	360
Escalante Canyons Tract 5 ISA	760
Devils Garden ISA	638
The Blues WSA	19,030
Fiftymile Mountain WSA	146,143
Death Ridge WSA	62,870
Burning Hills WSA	61,550
Mud Spring Canyon WSA	38,075
The Cockscomb WSA	10,080
Paria/Hackberry and Paria/Hackberry 202 WSA	135,822
Wahweap WSA	134,400
* WSA/ISA acres are total BLM acres from the Utah Statewide Wilderness Study Report, October 1991.	
Total acres reported elsewhere in this Plan were generated by a Geographic Information System (GIS) and vary slightly from those reported here.	

## THE 1999 UTAH WILDERNESS INVENTORY AND SECTION 202 PLANNING PROCESS

In response to an ongoing debate over whether additional lands in Utah should have been designated for wilderness study as part of the original inventory process under section 603 of FLPMA, a subsequent inventory of BLM lands was begun in 1996 and was completed in early 1999. This effort inventoried areas covered in proposed legislation before Congress at that time (HR 1500 and HR 1745). Out of 3.1 million acres inventoried, the BLM found 2.6 million acres with wilderness characteristics (in addition to the existing WSAs in the State), of which 457,049 acres are within the Monument. In March 1999, the BLM began a planning process under Section 202 of FLPMA to consider whether to include any of these additional lands in new Section 202 WSAs. The 202 process is being carried out separately from the planning process for the Monument, and is expected to be completed in 2000. Thus, recommendations on wilderness suitability for these areas are beyond the scope of this Plan.

Because the reinventory results were not available until February 1999, the Monument Planning Team was not able to consider the inventory in the development of the DMP/DEIS released in November 1998. While the reinventory results were available for the preparation of this Plan, and while



they were considered along with other relevant inventories in the planning process, the policy of the BLM is not to manage the additional acres with wilderness characteristics as if they were already in a WSA. Thus, the prescriptions of this Plan would apply to these lands unless additional WSAs are identified. The BLM would continue to give careful consideration before acting affirmatively on any proposals for activities on these lands. The normal requirements of law, such as environmental evaluation under NEPA, apply to any such proposals.

## **COOPERATION AND CONSULTATION**

### **CONSULTATION WITH NATIVE AMERICAN INDIANS**

Although limited in the recent past, use by Native American Indians of the Monument and its resources has been extensive for centuries prior to European contact. Native American Indians continue to use this area for plant collection and pilgrimages, and many places within the Monument are considered important to the continuity of their contemporary cultures.

Consultation for this planning effort has been undertaken with the following tribal groups: Hopi, Zuni, Navajo, Kaibab Paiute, Paiute Tribes of Utah, San Juan Paiute, and Ute. Consultation has consisted of information letters, telephone calls, meetings and field trips. In addition to the planning effort, the

BLM has also conducted consultation on BLM projects, Native American Graves Protection and Repatriation Act, and workshops on potential interpretive topics and perspectives. This consultation would continue throughout Plan implementation.

The Monument has entered into active agreements on the collection of ethnographic data with the Hopi and the Kaibab Paiute. In the coming years the BLM would expand this effort to the other tribal groups and expand the breadth of this program.

### **COOPERATION WITH COMMUNITIES AND OTHER STATE AND FEDERAL AGENCIES**

The BLM 1997 Strategic Plan directs the agency to promote collaborative land and resource management to promote community-based planning. Monument Managers are committed to working with nearby communities, counties, and other State and Federal land management agencies to cooperatively accomplish land use objectives within the constraints of Federal law.

Examples of collaborative efforts already in place include BLM participation with the Southern Utah Planning Authorities Council (SUPAC) (a forum where senior Federal, State, and local officials meet regularly to discuss and resolve southern Utah land use planning issues); a quarterly coordination meeting with Kane and Garfield County Commissioners, where Federal land managers are invited to discuss current

management projects; and extensive involvement in administering specific projects within the Monument. The Monument Manager has directed staff to be available for any reasonable request to attend informational meetings. The Manager and staff have attended dozens of such meetings throughout the Nation and region to discuss the Monument planning process and to foster continuing public involvement. Chapter 4 describes the public participation process in detail. Chapter 4 also includes a section listing collaborative management objectives.

### **GSENM ADVISORY COMMITTEE**

A Grand Staircase-Escalante National Monument Advisory Committee (chartered under the Federal Advisory Committee Act) would be established to advise Monument managers on science issues and the achievement of management plan objectives. This committee would serve solely as an advisory committee, making recommendations to Monument management. Monument management would evaluate all Advisory Committee recommendations, but would ultimately be responsible for making all final decisions. The primary purpose for the establishment of this committee is to aid in achievement of the management plan objectives, through participation in the adaptive management program. In this capacity it would have several tasks. First would be to review evaluation reports produced by the



Management Science Team (comprised of the Assistant Monument Managers for Biological Sciences, Cultural and Earth Sciences, and Visitor Services) and make recommendations on protocols and projects to meet overall objectives. These evaluations would be completed regularly (see Appendix 3, **Implementation and Adaptive Management Framework**) and would compile monitoring data and assess the extent to which management plan objectives are being met. The second task would be to review research proposals and make recommendations on project necessity and validity. The Committee would also make recommendations regarding allocation of research funds through review of research and project proposals as well as needs identified through the evaluation process above. Finally, the Committee could be consulted on issues such as protocols for specific projects (i.e., vegetation restoration methods) or standards for excavation and curation of artifacts and objects. This Committee would meet at least twice a year to accomplish the tasks outlined above.

This Committee would be comprised primarily of scientists, reflecting its science focus. There would be eight scientists covering the areas of archaeology, paleontology, geology, botany, wildlife biology, history, social science, and systems ecology. In addition to scientists, there would be seven other Committee members: one local elected official from each county, one from State or tribal government, one from the environmental community, one educator, one from the outfitter and guide

community operating within the Monument, and one from the ranching community, operating within the Monument. These additional members would facilitate communication with adjacent agencies and stakeholders and provide insight into community and stakeholder concerns. Further details regarding frequency of meetings and selection of Committee members would be developed in the charter establishing this Committee.

## END NOTES

1. Some government entities may have a valid existing right to an access route under Revised Statutes (R.S.) 2477, Act of June 26, 1866, ch. 262, § 8, 14 Stat. 251 [codified as amended at 43 U.S.C. § 932 until repealed in 1976 by the Federal Land Policy and Management Act of 1976 (FLPMA), Public Law 94-579, Section 706(a), Stat. 2744, 2793 (1976)], which granted “[the right-of-way for the construction of highways over public lands, not reserved for public uses.]” As described in the United States Department of Interior, Report to Congress on R.S. 2477 (June 1993), claims of rights-of-ways under R.S. 2477 are contentious and complicated issues, which have resulted in extensive litigation. See e.g., Sierra Club v. Hotel, 848 F.2d 1068 (10th Cir. 1988); Southern Utah Wilderness Alliance v. Bureau of Land Management, Consolidated Case No. 2:96-CV-836-S (D. Utah, filed Oct. 3, 1996, pending). It is unknown whether any R.S. 2477 claims would be asserted in the Monument which are inconsistent with the transportation decisions made in the Approved Plan or whether any of those R.S. 2477 claims would be determined to be valid. To the extent inconsistent claims are made, the validity of those claims would have to be determined. If claims are determined to be valid R.S. 2477 highways, the Approved Plan would respect those as valid existing rights. Otherwise, the transportation system described in the Approved Plan would be the one administered in the Monument.

2. A “right-of-way” refers to the public lands authorized to be used or occupied pursuant to a right-of-way grant. A right-of-way grant authorizes the use of a right-of-way over, upon, under or through public land for construction, operation, maintenance and termination of a project

(from 43 U.S.C. Section 1761-1771, 43 CFR Ch. II, 2800.0-5).

3. An easement is a non-possessory, non-exclusive, interest in land which specifies the rights of the holder and the obligation of the Bureau of Land Management to use and manage the lands in a manner consistent with the terms of the easement. (from 43 U.S.C. 1732, 1733, 1740, 43 CFR 2920.0-5)

4. A lease is an authorization to possess and use public land for a fixed period of time. (from 43 CFR 2920.0-5)

5. Alaska National Interest Lands Conservation Act of 1980 (16 U.S.C. 3210). The courts have found that this provision applies nationally. Also found in BLM Manual 2800.06B.

6. WSA acres reported here are larger than reported in the DEIS because the boundary adjustment (Public Law 105-355) included more acres of the Wahweap WSA within the Monument.

